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BUCKLE UP: STATE CHILD SAFETY RESTRAINT LAWS NEED TO BE STRENGTHENED TO BETTER PROTECT CHILDREN

*Ellen A. Black**

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I. INTRODUCTION

On May 15, 2013, Cameron and Nicole Hinson were traveling in Big Sandy, Texas, in their vehicle with their one-year old son.¹ Cameron was driving, and Nicole was seated in the front passenger seat.² These parents wanted to ensure their son was safely restrained in the vehicle, so they restrained him in a forward-facing child safety restraint in the back seat.³ The family was driving when an SUV crossed the center line and hit the Hinsons' vehicle.⁴ Cameron and Nicole suffered temporary, minor injuries, but their son did not fare as well.⁵ Unfortunately, their son suffered a permanent spinal injury, rendering him partially paralyzed and unable to walk unassisted for the remainder of his life.⁶ Even though the Hinsons' son was restrained in a child safety restraint, the restraint was placed in a forward-facing position rather than a rear-facing position.⁷ A forward-facing position is a typical position for parents to place a one-year-old child, yet according to most medical experts, it is not the safest position in a vehicle for the child.⁸ However, many parents, like the Hinsons, are uninformed about the best practices for safely restraining their children, which can lead to severe, life-long injuries for the children, as illustrated by the Hinsons' story.⁹

From the moment a child is born and then discharged from the hospital, a parent is required by law in all fifty states to restrain the child in an appropriate child safety restraint when traveling in a vehicle.¹⁰ Restraining a helpless infant in a child safety restraint is a relatively easy

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1. Pls.' First Am. Compl., Apr. 1, 2016, No. 2:15-CV-713-JRG-RSP.

2. *Id.*

3. *Id.*

4. *Id.*

5. *Id.* Nicole, the mother, was treated in the hospital and released on the same day, and Cameron, the father, was released from the hospital after less than a week of treatment.

6. *Id.* Due to the car accident, catheters will have to be removed from his body every three hours for the remainder of his life. Robin Y. Richardson, *Jury Awards \$34.4M in Car Seat Trial*, MARSHALL NEWS MESSENGER (June 18, 2016), <https://www.marshallnewsmessenger.com/news/2016/jun/18/jury-awards-344m-in-car-seat-trial/>.

7. Pls.' First Am. Compl., *supra* note 1.

8. Dennis R. Durbin et al., *Technical Report—Child Passenger Safety*, 127 PEDIATRICS e1050, e1054 (Mar. 2011).

9. *See id.* at e1051.

10. *See id.* at e1061. The purpose of safety restraints is "to reduce the risk of ejection during a crash, better distribute the energy load of the crash through structurally stronger bones than soft tissues, limit the crash forces experienced by the vehicle occupant by prolonging the time of deceleration, and limit the contact of the occupant with interior vehicle structures." *Id.* at e1051.

decision for a parent, especially considering the underlying legal mandate.¹¹ Yet the subsequent decisions a parent must make regarding child safety restraints, such as when the child should be in a rear-facing safety restraint versus a forward-facing safety restraint or whether a five-year-old should use a booster seat versus the vehicle's safety belt, become increasingly harder with each phase of a child's life. Part of this difficulty is due to the knowledge void surrounding child safety restraints and the inconsistent information presented to the public on best practices.¹² Yet, to assist them in making child safety restraint decisions, parents depend upon pediatricians, law makers, child safety restraint manufacturers, and car manufacturers to provide them with the necessary information on best practices for protecting their children.¹³ Unfortunately, these entities, collectively, fall short of aiding parents in making the right choice.¹⁴

Ensuring that children, a populace whose well-being is frequently intentionally or unintentionally overlooked, are adequately secured when riding in a vehicle is an issue of utmost importance to public health.¹⁵ Vehicle accidents are the leading cause of death for children ages four and older.¹⁶ In fact, each year more than 5,000 children under the age of twenty-one die in vehicle accidents, yet this number does not take into account the more than 500,000 within this age group who are injured each year in vehicle accidents.¹⁷ These numbers have dramatically decreased throughout the last decade due to child safety restraint laws enacted throughout the United States, but even more children's lives could be saved if states enacted laws that mirror the recommendations posed by child safety restraint experts and supported by current scientific research.¹⁸

11. See *id.* at e1061 (discussing the requirement that young children be restrained in all fifty states and the District of Columbia).

12. Suzanne N. Brixey & Clare E. Guse, *Knowledge and Behaviors of Physicians and Caregivers About Appropriate Child Passenger Restraint Use*, 34 J. COMMUNITY HEALTH 547, 550 (2009) (discussing the "knowledge gaps" that caregivers and physicians have about best practices for child safety restraint use).

13. *Id.*

14. See *id.*; see also Faith Yingling et al., *Pediatricians' Knowledge, Perceptions, and Behaviors Regarding Car Booster Seats*, 36 J. COMMUNITY HEALTH 166, 170 (2011).

15. See, e.g., Jacob P. Byl, Note, *Protecting the Innocent with a Premium for Child Safety Regulations*, 8 U. MASS. L. REV. 264, 286 (2013) (explaining how adults make decisions on behalf of children, with some decisions not being in the children's best interests).

16. Durbin et al., *supra* note 8, at e1050.

17. *Id.*; see also CDC, *Leading Causes of Death, 2014* (citing injuries from motor vehicle accidents to 541,432 children between the ages of 1 year old to 21 years old for the year 2014), http://webappa.cdc.gov/sasweb/ncipc/leadcaus10_us.html (last visited Aug. 10, 2016).

18. See Larry Copeland, *CDC: Too Many Children Still Dying in Car Crashes*, USA TODAY,

In this current political backdrop where proposed increased regulation in any area of the law is criticized on both sides of the political spectrum, the decision of whether to propose strengthened regulations in the area of child safety restraints must be analyzed fully and carefully.¹⁹ Thus, this article reviews the history of child safety restraints and analyzes the relevant health agency recommendations to consider their accretive value in determining whether stronger child safety restraint laws should be enacted.²⁰ Next, the article reviews the current state of law in the area of child safety restraints and addresses arguments against strengthening the current laws.²¹ Lastly, the article concludes that states should enact the proposed model act to ensure that this nation's children ride safely restrained.²²

II. BRIEF HISTORY OF CHILD SAFETY RESTRAINT LAWS

Child safety restraints, commonly referred to as the greatest twentieth century invention for child safety, evolved alongside the car manufacturing industry, with the first child restraint being used in a motor vehicle over 115 years ago.²³ However, initial child restraints were not primarily for the child's safety, but rather, were to ensure that the child remained seated in one spot in the car and to raise the child to a level within the car to allow the child to see out the window, thereby increasing the enjoyment for the child, which translated to a more tolerable ride for the parent.²⁴

It was not until 1962 that an English inventor, Jean Ames, created the first child safety restraint, which consisted of a padded seat that adhered to rear passenger seats by straps.²⁵ Mr. Ames also created a rear-facing child safety restraint based upon "the concept of ride down—

Feb. 4, 2014 (citing a "43% drop in road crash deaths of children 12 and younger from 2002-2011, [but] more than 9,000 children in that age group died in crashes during that period").

19. See Mila Sohoni, *The Idea of "Too Much Law,"* 80 FORDHAM L. REV. 1585, 1590 (2012) ("Today, however, the call for legislative minimalism has become a stock proposal for both parties.").

20. See *infra* Parts II-III.

21. See *infra* Parts IV-V.

22. See *infra* Part VI.

23. Denise Majett, *Product Liability Claims for Defective Child Safety Seat*, 132 AM. JUR. TRIALS 181 § 5 (2016).

24. See *id.* In fact, the first child safety restraint consisted of a bag that closed with a drawstring and could attach to the car's seat. *Id.* Several decades later, the Bunny Bear Company manufactured child car seats, but they were meant to merely confine the child and make them more easily locatable to the adults in the car. See *id.*

25. See *id.* The restraint included a Y-shaped harness that fastened between the child's legs and the seat. See *id.*

that it is safest to decelerate in the same direction the vehicle is moving.”²⁶ During the 1960s, car manufacturers also designed child safety restraints, with Swedish car designers developing a rear-facing child safety restraint for infants to prevent injuries in vehicle accidents.²⁷ Eventually, some car manufacturers even designed integrated child safety restraints built directly into the car, although this integrated concept never reached significant proliferation among the auto industry.²⁸

In the 1970s, there was a shift towards child public safety among different advocates, including the medical community, insurance industry, and consumer safety groups, who strongly advocated for increased oversight and resources dedicated to mandatory child safety restraints.²⁹ These groups strongly advocated for increased oversight and resources dedicated to mandatory child safety restraints.³⁰ In 1971, the National Highway Traffic Safety Administration mandated certain design and performance requirements for child safety restraints.³¹ Seven years later, advocates celebrated victory when Tennessee became the first state to enact a law that required the use of child safety restraints.³² By 1985, all states had enacted legislation requiring the use of child safety restraints.³³ Starting in the 1990s, the National Highway Traffic

26. *See id.* American inventor, Leonard Rivkin, also created a child safety restraint around this same time, but his design involved a metal frame that could be attached to the front or back of the car’s seats. *See id.*

27. *See id.* Ford Motor Company, General Motors, and Chrysler also designed and manufactured child safety restraints from the late 1960s, with some manufacturers continuing to sell them up until the early 1990s. *See id.*

28. *See id.* For example, Volvo developed and released the world’s first integrated booster cushion in 1990. *Volvo Car Group Celebrates 50 Years of Dedication to Child Safety*, VOLVO (Apr. 14, 2014), <https://www.media.volvocars.com/global/en-gb/media/pressreleases/142390/volvo-car-group-celebrates-50-years-of-dedication-to-child-safety>. Furthermore, Dodge started integrating child seats into their Caravan design in the mid-2000s, and in 2015, Volvo came out with a luxury concept that featured a built-in rear-facing, adjustable, and removable infant child safety restraint complete with a storage drawer and built-in bottle-holder and warmer. *Are Built-in Car Seats Safer than Regular Ones?*, SAFERIDE4KIDS (Feb. 18, 2016), <https://saferide4kids.com/are-built-in-car-seats-better/>.

29. *See Majett, supra* note 23.

30. *Id.*

31. 49 C.F.R. § 571.213 (1971). Known as Federal Motor Vehicle Safety Standard No. 213, this final rulemaking, made effective in 1971, sets forth the criteria that child safety restraint manufacturers must follow for testing restraints to ensure that their restraints respond appropriately in the event of an accident. *Id.* Standard 213 defines different categories of child safety restraints, i.e., rear-facing seat, booster seat, and child restraint system. *Id.* at § 571.213(S4).

32. *See Majett, supra* note 23.

33. *Id.* Even though empirical evidence supporting the protective effect of child safety restraint devices was available in the early 1970s, laws requiring their use were not adopted by all fifty states until several years later. *See Jin Yung Bae et al., Child Passenger Safety Laws in the*

Safety Association and the American Academy of Pediatrics (AAP) developed child safety restraint standards in an effort to ensure child safety restraint laws were effectively protecting children at each phase of their lives.³⁴ Over the last few decades, states have enacted various iterations of child safety restraint laws based upon the emerging scientific research.³⁵ However, in recent years, there has been a catalyst for stronger child safety restraints laws due to specific recommendations from the AAP, as discussed below.³⁶

III. AMERICAN ACADEMY OF PEDIATRICS RECOMMENDATIONS

In March 2011, the AAP³⁷ issued new child safety restraint recommendations based upon compelling evidence-based research involving child safety restraints and vehicle accidents from previous decades.³⁸ These recommendations expounded upon the AAP's previous 2002 recommendations.³⁹ The AAP's recommendations refer to different types of child safety restraints; thus, to fully understand the AAP's recommendations, the different restraints must be defined.

Essentially, there are three different categories of child safety restraints available on the marketplace today: (1) rear-facing restraints; (2) forward-facing restraints; and (3) booster seats.⁴⁰ As the name implies, a rear-facing restraint is positioned so that the child is rear-facing and restrained with a five-point harness located on the safety

United States, 1978-2010: Policy Diffusion in the Absence of Strong Federal Intervention, 100 SOC. SCI. MED. 6 (2013).

34. See Bae et al., *supra* note 33, at 2 (emphasizing three best practices for safely restraining children: "(1) device-based restraints that are tailored to the age/size of individual child passengers; (2) rear seating; and (3) seatbelt wearing of minors who have outgrown child restraint devices but are still in need of supervision to comply with seatbelt requirements").

35. *Id.* at 5 (noting "[o]n average, states modified their child passenger safety laws six times over the 30-year period [between 1978-2010]").

36. See *infra* Part III.

37. The American Association of Pediatrics "is a professional membership organization of 64,000 primary care pediatricians, pediatric medical sub-specialists and pediatric surgical specialists dedicated to the health, safety, and well-being of infants, children, adolescents and young adults." AAP Facts, AMERICAN ACADEMY OF PEDIATRICS, <https://www.aap.org/en-us/about-the-aap/aap-facts/Pages/AAP-Facts.aspx?nfstatus=401&nftoken=00000000-0000-0000-0000-000000000000&nfstatusdescription=ERROR%3a+No+local+token> (last visited Apr. 21, 2017).

38. AMERICAN ACADEMY OF PEDIATRICS COMMITTEE ON INJURY, VIOLENCE, AND POISON PREVENTION, *Policy Statement—Child Passenger Safety*, 127 PEDIATRICS 788, 788-92 (Mar. 2011).

39. AMERICAN ACADEMY OF PEDIATRICS COMMITTEE ON INJURY AND POISON PREVENTION, *Selecting and Using the Most Appropriate Safety Seats for Growing Children: Guidelines for Counseling Parents*, AAP Gateway, 109 PEDIATRICS 550, 550-53 (Mar. 2002).

40. See *Car Seat Types*, NHTSA, <http://www.safercar.gov/parents/CarSeats/Car-Seat-Types.htm?view=full> (last visited Apr. 21, 2017).

restraint.⁴¹ Whereas, in a forward-facing restraint, the child rides in a forward-facing position and is also restrained by a five-point harness located on the restraint.⁴² A booster seat, which uses the vehicle's safety belt as a harness, is used to restrain children who have outgrown rear and forward-facing child safety restraints but are not big enough to safely ride restrained solely by the vehicle's safety belt.⁴³ There are also "all-in-one" child safety restraints that may be used initially as a rear-facing restraint and then subsequently positioned forward-facing and then lastly converted to a booster seat.⁴⁴

In its 2011 statement, the AAP set forth five recommendations for best practices to restrain children in a vehicle that cover every phase of a child's life, from infancy through adolescence.⁴⁵ Specifically, the AAP recommended the following:

1. All infants and toddlers should ride in a rear-facing car safety seat (CSS) until they are two years of age or until they reach the highest weight or height allowed by the manufacturer of their CSS.
2. All children two years or older, or those younger than two years who have outgrown the rear-facing weight or height

41. See *id.* Within the rear-facing restraint category, there are different types of restraints that may be placed in a rear-facing position. *Id.* There is an infant rear-facing child restraint that may only be used in a rear-facing position for infants, typically up until the age of eight months to one year old. *Id.* Even though this child safety restraint is used for a relatively short period of time, parents readily purchase this restraint not only because its smaller size seems more comfortable for infants, but also because it is portable and allows parents to easily transport an infant from the vehicle to another location without having to remove the infant from the restraint. See Michael K. Sachs & Stephanie M. Tombrello, *Car Seat Safety Buckling Up Isn't Always Enough*, 90 PEDIATRICBASICS 10, 11 (2000). A convertible child safety restraint is another type of restraint that may be used in the rear-facing position, yet as the name suggests, once the child becomes too large to ride in the rear-facing position, the restraint may be turned to a forward-facing position, where the child may remain in that position until he reaches the weight and height limits of the restraint. See NHTSA, *supra* note 40.

42. See NHTSA, *supra* note 40. Within the forward-facing category, there are three different types of restraints that may be used in the forward-facing position. *Id.* First, there is the convertible restraint that may initially be placed in a rear-facing position and then moved to a forward-facing position once the child is big enough. *Id.* A combination seat is another type of forward-facing restraint that allows the child to be restrained by a harness located on the restraint, but once the child reaches a certain weight and height limit, the child may use the combination seat as a booster seat, which would use the vehicle's safety belt to restrain the child. *Id.*

43. *Id.* Booster seats may either have a high back, which provides head and neck support for the child, or the booster seat may be backless where the child's back sits directly against the back of the seat. *Id.* Additionally, combination child safety restraints, which allow the child to ride forward-facing and be secured by the restraint's harness, may subsequently be used as a booster seat by using the vehicle's safety belt rather than the restraint's harness. *Id.*

44. *Id.*

45. AMERICAN ACADEMY OF PEDIATRICS, *supra* note 38, at 789-91.

limit for their CSS, should use a forward-facing CSS with a harness for as long as possible, up to the highest weight or height allowed by the manufacturer of their CSS.

3. All children whose weight or height is above the forward-facing limit for their CSS should use a belt-positioning booster seat until the vehicle lap-and-shoulder seat belt fits properly, typically when they have reached four feet nine inches in height and are between eight and twelve years of age.
4. When children are old and large enough to use the vehicle seat belt alone, they should always use lap-and-shoulder seat belts for optimal protection.
5. All children younger than thirteen years should be restrained in the rear seats of vehicles for optimal protection.

A. *Rear-Facing Recommendation*

Of these recommendations, the AAP explicitly recognized the first recommendation requiring children remain rear-facing until two years of age or until they reach the weight and height limits of the particular child safety restraint “represents a significant change from previous AAP policy.”⁴⁶ The AAP’s 2002 recommendations also recommended that children remain rear-facing, but only up to the weight and height limits of the child safety restraint, and included a minimum age of one year and weight of twenty pounds before the child should be turned forward-facing.⁴⁷ Thus, parents and pediatricians embraced this minimum one year and twenty pound limit as the acceptable, safe milestone for children. Upon a child’s first birthday, the parents would eagerly turn the child from rear to forward-facing, thereby disregarding the AAP’s recommendation to keep the child rear-facing until the child reached the weight and height limits of the restraint.⁴⁸ Yet, most convertible child

46. *Id.* at 791.

47. *Selecting and Using the Most Appropriate Safety Seats for Growing Children*, *supra* note 39, at 550.

48. *AAP Updates Recommendation on Car Seats*, AMERICAN ACADEMY OF PEDIATRICS (Mar. 21, 2011), <https://www.aap.org/en-us/about-the-aap/aap-press-room/pages/AAP-Updates-Recommendation-on-Car-Seats.aspx?nfstatus=401&nftoken=00000000-0000-0000-0000-000000000000&nfstatusdescription=ERROR:+No+local+token>. In fact, a 2008 study found that 21% of parents position their infant children who are younger than one-year-old or weigh less than twenty pounds in a forward-facing position, rather than a rear-facing position. *See* NHTSA, *Child Restraint Use in 2008—Overall Results* at 1 (May 2009), <https://crashstats.nhtsa.dot.gov/Api/Public/ViewPublication/811135>.

safety restraints enable a child to ride rear-facing until the child reaches the weight of forty pounds and the height of forty inches.⁴⁹ Based upon the Center for Disease Control's growth chart for children, a two-year-old boy in the fiftieth percentile weighs less than thirty pounds and is less than thirty-five inches tall, which is well within the limits for rear-facing restraints.⁵⁰ Thus, if parents followed the AAP's 2002 recommendation to keep their children rear-facing until the child reached the weight and height limits of the restraint, the average-sized child would have remained rear-facing until the age of two.

The AAP did not arbitrarily issue its recommendation to keep a child rear-facing until age two; instead, it was based upon compelling evidence and research. Researchers of a 2007 study found children ages zero to twenty-three months old were significantly more likely to be seriously injured when riding forward-facing compared to children in rear-facing child safety restraints.⁵¹ Specifically, the study showed children under age two are seventy-five percent less likely to die or be severely injured in a crash if they are in a rear-facing child safety restraint.⁵² Broken down further, the study found children under one year of age who were riding forward-facing were 1.79 times more likely to suffer a severe injury in a vehicle accident than those children riding rear-facing, and significantly, children ages twelve to twenty-three months who were riding forward-facing were 5.32 times more likely to suffer severe injury than those children riding rear-facing.⁵³ The study also revealed that all children from ages zero to twenty-three months were safer in rear-facing child safety restraints than in forward-facing child safety restraints in all types of crashes, whether frontal or side-impact crashes.⁵⁴

49. See, e.g., *Top 10 Convertible Car Seats*, DIAPERS.COM (2012), <http://www.diapers.com/best-convertible-seats-2012.aspx> (listing the best convertible child safety restraints where, based upon the average of these restraints, a child may remain rear-facing until the child weighs 41.5 pounds and is 44.2 inches tall).

50. See *2 to 20 Years: Boys Stature-For-Age and Weight-For-Age Percentiles*, CDC, <https://www.cdc.gov/growthcharts/data/set1clinical/cj41c021.pdf> (last visited Apr. 21, 2017); see also Durbin et al., *supra* note 8, at e1052 ("Nearly all (30 of 35) currently available convertible [child safety restraints] can accommodate children to 35 lb or more when used rear-facing, a weight that exceeds the 95th percentile for boys and girls at 24 months of age.").

51. B. Henary et al., *Car Safety Seats for Children: Rear Facing for Best Protection*, 13(6) *Injury Prevention* 398, 398-401 (2007). For the study, researchers used data from the United State National Highway Traffic Safety Administration's vehicle crash database for the years 1988 to 2003. *Id.* at 398.

52. AMERICAN ACADEMY OF PEDIATRICS, *supra* note 48.

53. See Henary, *supra* note 51, at 398.

54. *Id.* at 400-401.

Additionally, researchers determined that rear-facing child safety restraints are more effective than front-facing child safety restraints in preventing moderate to severe injuries because, “[b]y supporting the entire posterior torso, neck, head, and pelvis, a rear-facing car seat distributes crash forces over the entire body rather than focusing them only at belt contact points.”⁵⁵ A child under the age of two has a proportionately smaller neck compared to the child’s head, and the rear-facing position provides the necessary support to better prevent injuries in a car crash.⁵⁶ Researchers acknowledged the complexity of child safety restraint considerations, but emphasized the significant implications their findings could have on child safety restraint policy decisions.⁵⁷ In conclusion, the researchers recommended: “[t]o take maximum advantage of car seat protection, parents should prolong” keeping their children in rear-facing car seats.⁵⁸

The results of this study, which found that rear-facing child safety restraints were ninety-three percent effective compared to seventy-eight percent effective for forward-facing child safety restraints, mirrored the findings of a 2005 Swedish study, which found that rear-facing child safety restraints were ninety percent effective.⁵⁹ Sweden, where children routinely ride in rear-facing cars seats until the age of four, is frequently touted for its remarkable child car injury statistics.⁶⁰ In fact, children vehicle accident injuries and deaths have been essentially eliminated—only nine properly restrained rear-facing children died in vehicle crashes in Sweden during the seven-year period between 1992 and 1997.⁶¹ Thus, Sweden’s child safety restraint policy provides compelling data for the AAP’s policy recommendation that children should remain rear-facing until the age of two years.⁶²

55. *Id.* at 398.

56. *Id.* at 398. When looking at children solely in age range of twelve to twenty-three months, rear-facing child safety restraints are 16.9% more effective than front-facing child safety restraints in preventing moderate to severe injuries (86.2% compared to 69.3%). *Id.* at 401.

57. *Id.* at 401.

58. *Id.*

59. *Id.*

60. See Madonna Behen, *Rear-Facing Car Seats Advised at Least to Age 2*, N.Y. TIMES (March 21, 2011), http://www.nytimes.com/2011/03/022/health/policy/22carseat.html?_r=0. To allow children to remain rear-facing until at least the age of four, child safety restraints for children in Sweden are engineered to provide sufficient leg room for these older children. See Katherine Shaver, *Parents Wrestle with Rear-Facing Car Seat Advice*, THE WASHINGTON POST (Sept. 24, 2011), https://www.washingtonpost.com/local/parents-wrestle-with-rear-facing-carseat-advice/2011/09/08/gIQAb4cOuK_story.html.

61. Kathleen Weber, *Why Rear Facing is Safer*, REAR FACING TODDLERS, <http://www.rearfacingtoddlers.com/why-rear-facing-is-safer.html> (last visited Apr. 21, 20167).

62. In fact, children in the United States would likely also be safer if they remained rear-

B. *Forward-Facing Recommendation*

Regarding forward-facing child safety restraints, the AAP's 2011 recommendations clarified its 2002 recommendations, which had ambiguously stated that a convertible child restraint could be used in a forward-facing position for a child who weighed up to forty pounds and then a forward-facing restraint, combination restraint, or booster seat could be used until the child grew big enough to safely use the vehicle's safety belt.⁶³ Instead, the 2011 recommendation simplified when a child should ride in a forward-facing child safety restraint: when the child has outgrown the rear-facing child safety restraint according to the weight and height limits of the restraint up until the child reaches the weight or height limit of the forward-facing child restraint.⁶⁴ Essentially, the 2011 recommendation did not substantially alter the 2002 recommendations, but instead provided clearer guidance for pediatricians and parents.

The scientific research supporting the forward-facing recommendation is based upon research dating back to the 1980s, which revealed that children riding in a forward-facing child safety restraint have a seventy-one percent reduced risk of death and injury than children riding unrestrained.⁶⁵ When comparing forward-facing restraints with the vehicle's safety belt, the research remains compelling, with forward-facing restraints resulting in at least a seventy-one percent reduction from serious injuries and a twenty-eight percent reduction from death.⁶⁶ Thus, the AAP's forward-facing recommendation appears to be based upon credible evidence: children should ride in forward-facing child safety restraints once they have outgrown the rear-facing child safety restraint but are not big enough to be safely secured by the vehicle's seat belt.

C. *Booster Seat Recommendation*

The AAP's 2011 recommendations modified its prior 2002 recommendations regarding when a child may be moved from a forward-facing child safety restraint to a booster seat. The prior recommendations stated: a child should be placed in a forward-facing

facing beyond the age of two years; yet, due to the small number of children in the United States who remain rear-facing beyond the age of two years, there is little evidence for researchers to analyze. See Durbin et al., *supra* note 8, at 1054.

63. *Selecting and Using the Most Appropriate Safety Seats for Growing Children*, *supra* note 39.

64. AMERICAN ACADEMY OF PEDIATRICS, *supra* note 38, at 790.

65. See Durbin et al., *supra* note 8, at 1054.

66. *Id.*

seat, a combination seat, or a belt-positioning booster seat “when the child has outgrown a convertible safety seat but is too small to use the vehicle’s safety belts.”⁶⁷ The 2011 recommendations abandoned the “outgrow” language and instead included actual age and height requirements for when to move to booster seats.⁶⁸ Specifically, the AAP recommended that a child remain in a belt-positioning booster seat until the lap and shoulder belt appropriately fit the child, which will typically occur when the child reaches four feet and nine inches tall and is between eight to twelve years old.⁶⁹ If a child is not at least four feet and nine inches tall, which most children between two and eight years old have not yet reached, a vehicle’s lap and shoulder seat belt will not properly secure a child in an accident.⁷⁰ For these children, the booster seat operates to lift or “boost” the child to the necessary height so that the vehicle safety belt can provide the optimum safety to restrain the child in the event of an accident.⁷¹

The AAP’s booster seat recommendation was based upon extremely compelling research from several studies. For example, a 2009 study analyzed children four to eight years old who were involved in vehicle accidents in sixteen states and Washington D.C. during a span of nine years.⁷² This study corroborated earlier studies’ findings: booster seats significantly decreased the chance of injury in a vehicle accident. Unlike prior studies, the 2009 study included children ages six to eight years old to determine the efficacy of booster seats for older children.⁷³ The study revealed children positioned in a booster seat, even those children ages six to eight, had approximately half the risk of being

67. *Selecting and Using the Most Appropriate Safety Seats for Growing Children*, *supra* note 39, at 550.

68. AMERICAN ACADEMY OF PEDIATRICS, *supra* note 38, at 790.

69. *See id.* The AAP policy lists the following three questions to use when evaluating whether a child no longer needs a booster seat, and if the answer to any of the questions is no, the child should remain in the booster seat rather than using a seat belt: “Is the child tall enough to sit against the vehicle seat back with his or her knees bent at the edge of the vehicle seat without slouching and stay in this position comfortably throughout the trip? Does the shoulder belt lie across the middle of the chest and shoulder, not against the neck or face? Is the lap belt low and snug across the upper thighs, not the abdomen?” *Id.* at 791.

70. *See id.* at 791. The recommendations explain that the lap portion of the seat belt should fit “low across the hips and pelvis and the shoulder portion across the middle of the shoulder and chest.” *Id.*

71. *Id.*

72. *See* Kristy B. Arbogast et al., *Effectiveness of Belt Positioning Booster Seats: An Updated Assessment*, 124(5) PEDIATRICS 1281, 1281-86 (Nov. 2009).

73. *See id.* at 1282. The study was limited to children eight years old because there were no state laws at the time of the study that required children to remain in a booster seat past the age of eight, resulting in few children older than eight using booster seats. *Id.* at 1283.

injured in a car accident compared to those children restrained in the vehicle's seat belt.⁷⁴ The study also focused on the effectiveness of booster seats versus vehicle safety belts in the different types of crashes and determined there was a sixty-eight percent reduction in injury risk for children using booster seats in near-side impact crashes and an eighty-two percent risk reduction for far-side impact crashes.⁷⁵ Thus, the researchers concluded "parents, pediatricians, and health educators should continue to recommend as best practice the use of [booster seats] once a child outgrows a harness-based child restraint until he or she is at least 8 years of age."⁷⁶

D. Vehicle's Safety Belt

The AAP's 2011 recommendation highlighted the importance of using the vehicle's safety belt, which includes the lap and shoulder belts, for those children who "are old enough and large enough" for "optimal protection."⁷⁷ This pragmatic recommendation was based upon research indicating that, in passenger cars, back seat lap belts are thirty-two percent effective with regard to reducing fatalities and lap/shoulder belts are forty-four percent effective as compared to unrestrained passengers in the rear seat, whereas, in passenger vans and SUV's, lap belts are sixty-three percent more effective and lap/shoulder belts are seventy-three percent more effective compared to unrestrained rear seat occupants.⁷⁸ Although this recommendation may seem intuitive, the

74. See *id.* at 1284.

75. See *id.* The study explained that the reason for the large injury risk in side impact crashes related to the substantial frontal component in these crashes where "[t]he shoulder portion of the seat belt may have better fit on the child's shoulder when the child is in a booster seat and therefore provide better protection than a shoulder belt that fits poorly in the absence of a booster seat. The largest relative benefit was realized for children who were seated far side to the crash, for which the risk for torso rollout from the shoulder belt is the greatest." *Id.* at 1285.

76. *Id.* at 1286.

77. AMERICAN ACADEMY OF PEDIATRICS, *supra* note 38, at 790. The AAP's 2002 recommendation emphasized that only children who were large enough should use the vehicle's safety belt, but it did not unequivocally highlight the importance that the vehicle's safety belt should be used for those children who were old enough and large enough. See *Selecting and Using the Most Appropriate Safety Seats for Growing Children*, *supra* note 39, at 550.

78. See Christina Morgan, *Effectiveness of Lap/Shoulder Belts in the Back Outboard Seating Positions*, DEPT. OF TRANSP. NAT'L HIGHWAY TRAFFIC SAFETY ADMIN. TECHNICAL REPORT NO. DOT HS 808 945 at x-xii (Jun. 1999). The study focused on the use of lap belts and lap/shoulder belts and found that for all types of crashes, lap/shoulder belts are fifteen percent more effective than lap belts by themselves, and in frontal crashes, lap/shoulder belts are twenty-five percent more effective than lap belts by themselves and are twenty-nine percent more effective in reducing fatalities than unrestrained passengers. See *id.* at x. Even though lap belts in the rear seats can reduce head injury risk, they increase abdominal injury risk in potentially fatal frontal crashes,

importance of announcing it to the public should not be overlooked, considering a study found that in one year alone, over 600,000 children under the age of thirteen rode unrestrained at some point.⁷⁹

E. Rear Seat Age Restriction

The AAP's final 2011 recommendation succinctly declared "for optimal protection" children under the age of thirteen should be restrained in the vehicle's rear seat rather than the front seat.⁸⁰ The AAP's prior 2002 recommendation had not included a specific age, but instead had recommended "the rear seat of the vehicle is the safest place for children of any age to ride."⁸¹ The AAP's decision to include the specific age of thirteen years was based upon a study which determined that once a child reached the age of thirteen years, the positive effects of riding in the rear seat were no longer present.⁸² For those children younger than thirteen years, the research clearly indicates riding in the rear seat is safer, where children seated in the front seat are 1.7 times more likely to suffer a serious injury or death than those children seated in the rear seat.⁸³ Thus, the AAP's most recent recommendation provides bright-line guidance for parents regarding the appropriate age for a child to move from the rear seat to front seat, which is thirteen years old.⁸⁴

IV. CURRENT STATE LAWS

Even though all states currently have laws requiring children to use safety restraints, state laws vary greatly and elucidate the need for

where lap/shoulder belts reduce the risk of head injuries by forty-seven percent and adnominal injuries by fifty-two percent when compared to lap belts only in potentially fatal frontal crashes. *See id.* at xii. But for children between the ages of five to fourteen, lap/shoulder belts provide the greatest benefit, as the lap/shoulder belts are twenty-six percent more effective in reducing fatalities for this age group compared to just a lap belt. *See id.* at xi.

79. *See* Arlene I. Greenspan et al., *Restraint Use and Seating Position Among Children Less Than 13 Years of Age: Is It Still a Problem?* 41 J. OF SAFETY RESEARCH 183 (2010).

80. *See* AMERICAN ACADEMY OF PEDIATRICS, *supra* note 38, at 790-91.

81. *See* *Selecting and Using the Most Appropriate Safety Seats for Growing Children*, *supra* note 39, at 551.

82. *See* Durbin et al., *supra* note 8, at 1057.

83. *See* Marc D. Berg et al., *Effect of Seating Position and Restraint Use on Injuries to Children in Motor Vehicle Crashes*, 105(4) PEDIATRICS 831, 833 (Apr. 2000); *see also* Dennis R. Durbin et al., *Effects of Seating Position and Appropriate Restraint Use on the Risk of Injury to Children in Motor Vehicle Crashes*, 115(3) PEDIATRICS 305, 308 (Mar. 2005) (finding that children seated in the front of the car had a forty percent greater chance of injury compared to children in the back seat).

84. *See* AMERICAN ACADEMY OF PEDIATRICS, *supra* note 38, at 790-91.

greater understanding of this important public health concern.⁸⁵ An example of this discrepancy becomes apparent when considering the AAP's previously discussed recommendations. Over five years ago, the AAP, arguably one of the most knowledgeable and interested organizations regarding children safety issues, released its recommendations concerning child safety restraints.⁸⁶ However, to date, only four states—California, New Jersey, Oklahoma and Pennsylvania—have enacted legislation attempting to emulate those recommendations.⁸⁷ To fully understand the vast differences among the state laws across this country regarding child safety restraints, a broad overview of state laws in this area is helpful.

State laws fluctuate in how they prescribe children be restrained in a vehicle, with some state laws including specific mandates and other states offering only a modicum of specificity.⁸⁸ However, there are some observable generalizations regarding the law in this area. For example, some state laws address child safety restraint regulations based solely upon the age of the child,⁸⁹ and most state laws correlate an age

85. See Durbin et al., *supra* note 8, at 1061 (discussing the history of child restraint laws which included the passage of such laws by 1985 in all fifty states and the District of Columbia).

86. See *supra* Part III.

87. See CAL. VEH. CODE § 27360 (West effective Jan. 1, 2017); N.J. STAT. ANN. § 39:3-76.2a (West effective Sept. 1, 2015); OKLA. STAT. tit. 47, § 11-1112 (West 2015); 75 PA. CONS. STAT. § 4581 (2016). These states include certain weight and height restrictions that may overcome some of the AAP's recommendations. For example, California's law states that a child must remain rear-facing unless the child weighs forty or more pounds or is forty or more inches tall. See CAL. VEH. CODE § 27360(b) (West effective Jan. 1, 2017). Somewhat similarly, New Jersey requires a child under the age of two and weighing less than thirty pounds must remain rear-facing in a child safety restraint. See N.J. STAT. ANN. § 39:3-76.2a(a) (West effective Sept. 1, 2015). Oklahoma requires a child to remain secured in a child safety restraint rear-facing "until the child reaches two (2) years of age or until the child reaches the weight or height limit of the rear-facing child passenger restraint." OKLA. STAT. tit. 47, § 11-1112(A)(1) (West 2015). Similarly, Pennsylvania requires a child under two years old to remain secured "in a rear-facing child passenger restraint system, to be used until the child outgrows the maximum weight and height limits designated by the manufacturer." 75 PA. CONS. STAT. § 4581(a)(1)(ii) (2016).

88. Compare IDAHO CODE ANN. § 49-672 (1) (West 2005) (specifying Idaho's child restraint law with simple mandate that "No noncommercial motor vehicle operator shall transport a child who is six (6) years of age or younger in a motor vehicle manufactured with seat belts after January 1, 1966, unless the child is properly secured in a child safety restraint that meets the requirements of federal motor vehicle standard no. 213."), with N.J. STAT. ANN. § 39:3-76.2a (West effective Sept. 1, 2015) (detailing New Jersey's child restraint law that sets out with great specificity the child safety restraint requirements for children under two years of age to be rear-facing, children under four years of age to be rear or forward-facing depending upon the restraint's height and weight requirements, and children under eight years of age to be restrained in forward-facing restraint or booster seat).

89. See, e.g., 75 PA. CONS. STAT. § 4581(a) (2016) (requiring child safety restraint for "child under four years of age" and a booster seat for "a child four years of age or older but under eight years").

requirement to the weight and/or height of the child.⁹⁰ Some state laws also mandate the type of child safety restraint that should be used, i.e., booster seat or rear or forward-facing seat, and where the restraint should be placed in the vehicle.⁹¹ However, beyond these generalities, the discrepancies among the state laws are wide-ranging, with no two state laws being completely identical.

A. *State Rear-Facing Child Safety Restraint Requirements for Two-Year-Olds*

As noted previously, there are only four states—California, New Jersey, Oklahoma, and Pennsylvania—requiring a child to remain rear-facing until they reach two years old.⁹² Of these states, Oklahoma and Pennsylvania are the only states that adopt the language of the AAP's recommendation by requiring the child remain rear-facing until the child reaches two years of age or until the child reaches the weight and height limits of the rear-facing child safety restraint.⁹³ New Jersey only requires children remain rear-facing if the child is under the age of two years old and weighs less than thirty pounds.⁹⁴ California, on the other hand, requires the child to remain rear-facing if he is under two years old and weighs less than forty pounds or is less than forty inches tall.⁹⁵ Thus, of these four states, Oklahoma⁹⁶ and Pennsylvania⁹⁷ expressly adopted the AAP's recommendation, and California⁹⁸ in effect did as well, since the weight and height limits of rear-facing child safety restraints is typically forty pounds and forty inches.⁹⁹ New Jersey, however, adopted a less stringent rear-facing requirement by lowering the weight limit to thirty pounds, compared to the typical forty-pound limit.¹⁰⁰ Even in the face of

90. See, e.g., ALA. CODE § 32-5-222(b) (1975) (requiring particular child safety restraints for children under one year of age or weighing less than twenty pounds and children younger than five years of age or weighing less than forty pounds).

91. See, e.g., N.J. STAT. ANN. § 39:3-76.2a (West effective Sept. 1, 2015) (specifying particular child safety restraint, i.e., rear-facing, forward-facing, and booster seat, and that restraints should be placed in the rear seat).

92. See *supra* note 87 and accompanying text.

93. OKLA. STAT. tit. 47, § 11-1112(A)(1) (West 2015); 75 PA. CONS. STAT. § 4581(a)(1)(ii) (2016).

94. N.J. STAT. ANN. § 39:3-76.2a (a) (West effective Sept. 1, 2015).

95. CAL. VEH. CODE § 27360 (West effective Jan. 1, 2017).

96. OKLA. STAT. tit. 47, § 11-1112(A)(1) (West 2015).

97. 75 PA. CONS. STAT. § 4581(a)(1)(ii) (2016).

98. See CAL. VEH. CODE § 27360 (West effective Jan. 1, 2017).

99. See *supra* note 49 and accompanying text (discussing the height and weight average requirements for convertible child safety restraints).

100. See N.J. STAT. ANN. § 39:3-76.2a (a) (West effective Sept. 1, 2015).

the AAP's recommendation and compelling research that children are much safer when riding rear-facing, only four states currently have laws that require children to remain rear-facing until the age of two years old.

B. State Rear-Facing Child Restraint Requirements for One-Year-Olds

As discussed previously, the AAP in its 2002 recommendation stated that children should remain rear-facing up to the weight and height limits of the child safety restraint and included a minimum age of one year and weight of twenty pounds before the child should be turned forward-facing.¹⁰¹ Lawmakers evidently ignored the AAP's language regarding the weight and height limit of the child safety restraint, which would have equated to a weight and height limit of forty pounds and forty inches, respectively, for most child safety restraints, and instead seized upon the minimum one-year-old age requirement. Thus, there are currently twelve states requiring a child to remain rear-facing until the child is one year old or weighs twenty pounds.¹⁰² Of these twelve states, only three explicitly require a child over one year old and under twenty pounds be restrained in a rear-facing position.¹⁰³ Most notable, however, is that thirty-four states have no laws requiring children to be rear-facing at any age.¹⁰⁴ In these states, even a newborn infant traveling from the

101. See *supra* note 47.

102. ALA. CODE § 32-5-222(b)(1) (1975) ("one year of age or 20 pounds"); ALASKA STAT. ANN. § 28.05.095(b)(1) (West 2016) ("less than one year of age or a child one year of age or older who weighs less than 20 pounds"); COLO. REV. STAT. ANN. § 42-4-236(2)(a)(ii) (West 2011) ("less than one year of age and weighs less than twenty pounds"); CONN. GEN. STAT. § 14-100A(d)(2) (West 2014) ("under one year of age or weighing less than twenty pounds"); IOWA CODE ANN. § 321.446(1)(a) (West 2014) ("A child under one year of age and weighing less than twenty pounds"); LA. STAT. ANN. § 32:295(A)(1)(a) (2009) ("A child who is younger than one year of age or weighs less than twenty pounds"); N.M. STAT. ANN. § 66-7-369(B)(1) (2005) ("children less than one year of age shall be properly secured in a rear-facing child passenger restraint device"); OR. REV. STAT. ANN. § 811.210(2)(a) (West 2012) ("under one year of age, regardless of weight, or a person who weighs 20 pounds or less"); S.C. CODE ANN. § 56-5-6410(1) (2016) ("from birth up to one year of age or who weighs less than twenty pounds"); TENN. CODE ANN. § 55-9-602(a)(1) (West 2016) ("Any person transporting any child, under one (1) year of age, or any child, weighing twenty pounds (20 lbs.) or less"); VT. STATE ANN. tit. 23, § 1258(a)(1) (West 2015) ("all children under the age of one, and all children weighing less than 20 pounds, regardless of age"); WIS. STAT. ANN. § 347.48(4)(c)(1) (West 2011) ("If the child is less than one year old or weighs less than 20 pounds").

103. ALASKA STAT. ANN. § 28.05.095 (West 2016) ("less than one year of age or a child one year of age or older who weighs less than 20 pounds"); OR. REV. STAT. ANN. § 811.210(2)(a) (West 2012) ("under one year of age, regardless of weight, or a person who weighs 20 pounds or less"); VT. STATE ANN. tit. 23, § 1258(a)(1) (West 2015) ("all children under the age of one, and all children weighing less than 20 pounds, regardless of age").

104. ARIZ. REV. STAT. ANN. § 28-907 (West 2016); ARK. ADMIN. CODE 016.15.4-I-H (2013); DEL. CODE ANN. tit. 21, § 4803 (West 2007); FLA. STAT. ANN. § 316.613 (West 2016); GA. CODE

hospital and riding in a vehicle for the first time would not be required to be placed rear-facing in the vehicle. These states ignored the AAP's 2002 and 2011 recommendations: young children are safest in a vehicle when riding rear-facing.

C. *State Laws Requiring Forward-Facing Child Safety Restraints*

The AAP's most recent recommendation stated: children who are over two years old or those who are younger than two years old and have outgrown the weight and height limits of their rear-facing child safety restraint should be restrained in a forward-facing restraint until the child outgrows the weight and height limits of the forward-facing child safety restraint.¹⁰⁵ Most state child safety restraint laws do not explicitly reference a forward-facing child safety restraint. In fact, only seven states include a requirement that a child be placed in a forward-facing child safety restraint.¹⁰⁶ Most states do not include a level of specificity that distinguishes between rear and forward-facing child safety restraints and booster seats; instead, these states vaguely recommend the child be restrained in a "child passenger restraint system."¹⁰⁷ Although several

ANN. § 40-8-76 (West 2011); HAW. REV. STAT. ANN. § 291-11.5 (West 2011); IDAHO CODE ANN. § 49-672 (West 2005); 625 ILL. COMP. STAT. ANN. 25/4 (West 2008); IND. CODE ANN. § 9-19-11-2 (West 2009); KAN. STAT. ANN. § 8-1344 (West 2015); KY. REV. STAT. ANN. § 189.125 (West 2016); ME. REV. STAT. ANN. tit. 29, § 2081 (2009); MD. CODE ANN. Transportation § 22-412.2 (West 2013); MASS. GEN. LAWS ANN. ch. 90, § 7AA (West 2008); MICH. COMP. LAWS ANN. § 257.710d (West 2009); MINN. STAT. ANN. § 169.685 (West 2014); MO. ANN. STAT. § 307.179 (West 2016); MISS. CODE ANN. § 63-7-301 (West 2008); MONT. CODE ANN. § 61-9-420 (West 2011); NEB. REV. ST. ANN. § 60-6, 267 (West 2015); NEV. REV. STAT. ANN. § 484B.157 (West 2009); N.H. REV. STAT. ANN. § 265:107-a (2015); N.Y. VEH. & TRAF. LAW § 1229-c (McKinney 2010); CONN. GEN. STAT. § 20-137.1; N.D. CENT. CODE ANN. § 39-21-41.2 (West 2005); OHIO REV. CODE ANN. § 4511.81 (West 2014); 31 R.I. GEN. LAWS ANN. § 31-22-22 (West 2016); S.D. CODIFIED LAWS § 32-37-1 (2016); TEX. TRANSPORTATION CODE ANN. § 545.412 (West 2015); UTAH CODE ANN. 1953 § 41-6a-1803 (West 2016); VA. CODE ANN. § 46.2-1095 (West 2010); WASH. REV. CODE ANN. § 46.61.687 (West 2010); W. VA. CODE ANN. § 17C-15-46 (West 2016); WYO. STAT. ANN. § 31-5-1303 (West 2016).

105. See AMERICAN ACADEMY OF PEDIATRICS, *supra* note 38, at 790.

106. See ALA. CODE § 32-5-222(b)(2) (1975); COLO. REV. STAT. ANN. § 42-4-236(2)(a)(iii) (West 2011); LA. STAT. ANN. § 32:295(b) (2009); N.J. STAT. ANN. § 39:3-76.2a(b)(1) (West effective Sept. 1, 2015); S.C. CODE ANN. § 56-5-6410(2) (2016); TENN. CODE ANN. § 55-9-602(a)(2) (West 2016); WIS. STAT. ANN. § 347.48(4)(c)(2) (West 2011).

107. See, e.g., ARIZ. REV. STAT. ANN. § 28-907(B) (West 2016) (mandating that a child under five years of age or under eight years old and shorter than fifty-seven inches be placed in a "child restraint system"); HAW. REV. STAT. ANN. § 291-11.5(a)(1) (West 2011) (requiring a child under the age of four to be restrained in a "child passenger restraint system"); IDAHO CODE ANN. § 49-672(1) (West 2005) (requiring that a child under the age of six be properly secured in a "child safety restraint"); 625 ILL. COMP. STAT. ANN. 25/4 (West 2008) (requiring child under the age of eight to be secured "in an appropriate child restraint system"); IND. CODE ANN. § 9-19-11-2(a) (West 2009) (requiring that a child under the age of eight be properly secured in a suitable child restraint

states differentiate between rear-facing child safety restraints and booster seats, these states do not specifically require forward-facing restraints and instead conflate booster seats with forward-facing restraints.¹⁰⁸ By overlooking the distinction between forward-facing child safety restraints and booster seats, states are overtly implying to parents their children may be ready for a booster seat when in fact a forward-facing restraint—with a five-point harness—would be safer.¹⁰⁹

D. State Child Safety Restraint Laws Requiring Booster Seats

Once children reach the weight and height limits of a forward-facing seat, the AAP recommends that children use a belt-positioning booster seat until the vehicle lap-and-shoulder seat belt fits properly,

system); KAN. STAT. ANN. § 8-1344(a) (West 2015) (requiring children under four or under eight and meeting certain height and weight requirements be properly secured in an “appropriate child passenger safety restraining system”); MASS. GEN. LAWS ANN. ch. 90, § 7AA (West 2008) (passengers “under the age of 8 shall be fastened and secured by a child passenger restraint, unless such passenger measures more than 57 inches in height”); MICH. COMP. LAWS ANN. § 257.710d(1) (West 2009) (“driver transporting a child less than 4 years of age in a motor vehicle shall properly secure that child in a child restraint system”); MO. ANN. STAT. § 307.179(2) (West 2016) (children less than four years old or under forty pounds “shall be secured in a child passenger restraint system appropriate for that child”); 75 PA. CONS. STAT. § 4581 (2016)(a)(1)(i) (requiring that child under four years old shall be secured “in a child passenger restraint system”); UTAH CODE ANN. 1953 § 41-6a-1803(1)(a)(ii) (West 2016) (children under the age of eight shall be restrained in a “child restraint device”); WASH. REV. CODE ANN. § 46.61.687 (1)(a) (West 2010) (“A child must be restrained in a child restraint system . . . until the child is eight years old, unless the child is four feet nine inches or taller.”).

108. See, e.g., D.C. CODE ANN. § 50-1703(b) (West 2001) (“Children under 8 years of age shall be properly seated in an installed infant, convertible (toddler) or booster child safety seat”); FLA. STAT. ANN. § 316.613(1)(a)(2) (West 2016) (“For children aged 4 through 5 years, a separate carrier, an integrated child seat, or a child booster seat may be used.”); HAW. REV. STAT. ANN. § 291-11.5(a)(2) (West 2011) (requiring children between the ages of four and seven to be “properly restrained in a child safety seat or booster seat”); MO. ANN. STAT. § 307.179(2)(3) (West 2016) (“Children at least four years of age but less than eight years of age, who also weigh at least forty pounds but less than eighty pounds . . . shall be secured in a child passenger restraint system or booster seat”); N.J. STAT. ANN. § 39:3-76.2a(c) (West effective Sept. 1, 2015) (requiring a child under the age of eight years and less than fifty-seven inches in height to be secured in either a forward facing child passenger restraint system or a booster seat); N.M. STAT. ANN. § 66-7-369(B)(3) (1978) (requiring children five years of age through six years of age to be secured in either a “child booster seat or an appropriate child passenger restraint”); OKLA. STAT. ANN. tit. 47, § 11-1112(A)(2) (West 2015) (“A child at least four (4) years of age but younger than eight (8) years of age, if not taller than 4 feet 9 inches in height, shall be properly secured in either a child passenger restraint system or child booster seat”); WIS. STAT. ANN. § 347.48(4)(c) (West 2011) (requiring children between the ages of four and seven and weighing under eighty pounds to be secured in a forward-facing child safety restraint system or a child booster seat).

109. There is evidence suggesting five-point harnesses are safer than booster seats for three and four year olds. There is not enough data to make definite claims that one is safer than the other for older children. NHTSA, *Booster Seat Effectiveness Estimates Based on CDS and State Data* at 9-11 (July 2010), <https://crashstats.nhtsa.dot.gov/Api/Public/ViewPublication/811338>.

which typically occurs when the child reaches four feet and nine inches in height and is between eight and twelve years of age.¹¹⁰ This AAP recommendation provides a varying standard for when a child no longer needs to be restrained in a booster seat based upon the particular size of the individual child, which on its face appears to be necessary to ensure parents have latitude to make the best choice for how long their children should remain restrained in a booster seat. However, the recommendation may lack specificity for parents to easily follow or for lawmakers to propose legislation that mirrors the recommendation. For example, there are no states that require children to be restrained in a booster seat as recommended by the AAP until the child is between the age of eight and twelve *and* is four feet nine inches. Instead, most states require a child to be restrained in a booster seat (or a child restraint system) until the child reaches a particular age or is a particular height or weight; thus, when a child reaches that age or height or weight, the booster seat requirement ceases.¹¹¹

Even though most states require a child to use a booster seat or some other “appropriate” child safety restraint, the age variations among the states as to when a child is no longer required to be restrained in such a device is surprising.¹¹² There are thirty-one states¹¹³ requiring a child

110. See AMERICAN ACADEMY OF PEDIATRICS, *supra* note 38, at 790.

111. See, e.g., ALASKA STAT. ANN. § 28.05.095(b)(4) (West 2016) (requiring children between four and eight years old to be restrained in a booster seat unless the child is more than fifty-seven inches in height and weighs more than sixty-five pounds); HAW. REV. STAT. ANN. § 291-11.5(a)(3) (West 2011) (requiring a child that is between four and eight years old to be restrained in a child safety restraint or booster seat unless the child is over four feet and nine inches in height).

112. Compare WYO. STAT. ANN. § 31-5-1303(a) (West 2016) (requiring a child to be restrained in a child safety restraint until the age of nine years old), with S.D. CODIFIED LAWS § 32-37-1 (2016) (requiring a child to be restrained in a child safety restraint until the age of five years old).

113. See ALASKA STAT. ANN. § 28.05.095 (West 2016); ARIZ. REV. STAT. ANN. § 28-907 (West 2016); CAL. VEH. CODE § 27360 (West 2017); COLO. REV. STAT. ANN. § 42-4-236 (West 2011); DEL. CODE ANN. tit. 21, § 4803 (West 2007); GA. CODE ANN. § 40-8-76 (West 2011); HAW. REV. STAT. ANN. § 291-11.5 (West 2011); 625 ILL. COMP. STAT. ANN. 25/4 (West 2008); IND. CODE ANN. § 9-19-11-2 (West 2009); KAN. STAT. ANN. § 8-1344 (West 2015); KY. REV. STAT. ANN. § 189.125 (West 2016); ME. REV. STAT. ANN. tit. 29, § 2081 (2009); MD. CODE ANN., TRANSP. § 22-412.2 (West 2013); MASS. GEN. LAWS ANN. ch. 90, § 7AA (West 2008); MINN. STAT. ANN. § 169.685 (West 2014); MO. ANN. STAT. § 307.179 (West 2016); N.J. STAT. ANN. § 39:3-76.2 (West effective Sept. 1, 2015); N.Y. VEH. & TRAF. LAW § 1229-c (McKinney 2010); N.C. GEN. STAT. ANN. § 20-137.1 (West 2007); OHIO REV. CODE ANN. § 4511.81 (West 2014); OKLA. STAT. ANN. tit. 47, § 11-1112 (West 2015); 75 PA. CONS. STAT. § 4581 (2016); 31 R.I. GEN. LAWS ANN. § 31-22-22 (West 2016); TENN. CODE ANN. § 55-9-602 (West 2016); TEX. TRANSP. CODE ANN. § 545.412 (West 2015); UTAH CODE ANN. 1953 § 41-6a-1803 (West 2016); VT. STATE ANN. tit. 23, § 1258 (West 2015); VA. CODE ANN. § 46.2-1095 (West 2010); WASH. REV. CODE ANN. § 46.61.687 (West 2010); W. VA. CODE ANN. § 17C-15-46 (West 2016); WIS. STAT. ANN. § 347.48 (West 2011).

to be restrained in a booster seat until the age of eight, but twenty-two of these states contain either a weight or height exemption allowing a child to use the vehicle's safety belt instead of a booster seat or other child restraint device if the child is within that particular weight or height exemption.¹¹⁴ Most of the states that have an exemption have incorporated the AAP's suggested height of four feet and nine inches for when a child may safely use the vehicle's safety restraint.¹¹⁵

Although most states use the age of eight as the bright-line for when the vehicle's safety belt may be used instead of a booster seat or other child safety restraint, there are several states that have lower age limits.¹¹⁶ For example, there are five states that only require a booster seat or other safety restraint for children until the age of seven;¹¹⁷ there are eleven states that only require a booster seat or other safety restraint until the age of six;¹¹⁸ and there is one state that only requires a booster

114. ALASKA STAT. ANN. § 28.05.095 (West 2016); ARIZ. REV. STAT. ANN. § 28-907 (West 2016); DEL. CODE ANN. tit. 21, § 4803 (West 2007); HAW. REV. STAT. ANN. § 291-11.5 (West 2011); 625 ILL. COMP. STAT. ANN. 25/4 (West 2008); KAN. STAT. ANN. § 8-1344 (West 2015); KY. REV. STAT. ANN. § 189.125 (West 2016); ME. REV. STAT. ANN. tit. 29, § 2081 (2009); MD. CODE ANN., TRANSP. § 22-412.2 (West 2013); MASS. GEN. LAWS ANN. ch. 90, § 7AA (West 2008); MINN. STAT. ANN. § 169.685 (West 2014); MO. ANN. STAT. § 307.179 (West 2016); N.J. STAT. ANN. § 39:3-76.2 (West 2015); N.C. GEN. STAT. ANN. § 20-137.1 (West 2007); OKLA. STAT. ANN. tit. 47, § 11-1112 (West 2015); 31 R.I. GEN. LAWS ANN. § 31-22-22 (West 2016); TENN. CODE ANN. § 55-9-602 (West 2016); TEX. TRANSP. CODE ANN. § 545.412 (West 2015); UTAH CODE ANN. § 41-6a-1803 (West 2016); WASH. REV. CODE ANN. § 46.61.687 (West 2010); W. VA. CODE ANN. § 17C-15-46 (West 2016); WIS. STAT. ANN. § 347.48 (West 2011).

115. See ALASKA STAT. ANN. § 28.05.095; ARIZ. REV. STAT. ANN. § 28-907 (West 2016); CAL. VEH. CODE § 27360 (West 2017); HAW. REV. STAT. ANN. § 291-11.5 (West 2011); KAN. STAT. ANN. § 8-1344 (West 2015); KY. REV. STAT. ANN. § 189.125 (West 2016); MD. CODE ANN. § 22-412.2 (West 2013); MASS. GEN. LAWS ANN. ch. 90, § 7AA (West 2008); MINN. STAT. ANN. § 169.685 (West 2014); MISS. CODE ANN. § 63-7-301 (West 2008); N.J. STAT. ANN. 39:3-76.2a (West 2015); N.D. CENT. CODE ANN. § 39-21-41.2 (West 2005); OHIO REV. CODE ANN. § 4511.81 (West 2014); OKLA. STAT. tit. 47, § 11-1112 (West 2015); OR. REV. STAT. ANN. § 811.210 (West 2012); 31 R.I. GEN. LAWS ANN. § 31-22-22 (West 2016); TENN. CODE ANN. § 55-9-602 (West 2016); TEX. TRANSP. CODE ANN. § 545.412 (West 2015); UTAH CODE ANN. § 41-6a-1803 (West 2016); WASH. REV. CODE ANN. § 46.61.687 (West 2010); W. VA. CODE ANN. § 17C-15-46 (West 2016); WIS. STAT. ANN. § 347.48 (West 2011).

116. But see WYO. STAT. ANN. § 31-5-1303(a) (West 2016) (requiring "each child who is a passenger in that vehicle and who has not reached his ninth birthday [must be] properly secured in a child safety restraint system").

117. See CONN. GEN. STAT. § 14-100A (West 2014); DEL. CODE ANN. tit. 21, § 4803(a) (2007); IDAHO CODE ANN. § 49-672(1) (West 2005); MISS. CODE ANN. § 63-7-301(1)(b) (West 2008); N.M. STAT. ANN. § 66-7-369(B)(3) (West 2005).

118. See ALA. CODE § 32-5-222(b)(3) (1975); ARK. ADMIN. CODE 016.15.4-I-H (2013); FLA. STAT. ANN. § 316.613(2) (West 2016); IOWA CODE ANN. § 321.446(1)(b) (West 2014); LA. STAT. ANN. § 32:295(A)(1)(c) (2009); MONT. CODE ANN. § 61-9-420(1) (West 2011); NEB. REV. ST. ANN. § 60-6, 267(1) (West 2015); NEV. REV. STAT. ANN. § 484B.157 (West 2009); N.H. REV. STAT. ANN. § 265:107-a(I)(1-b) (2015); N.D. CENT. CODE ANN. § 39-21-41.2(1) (West 2005); S.C. CODE ANN. § 56-5-6410 (2001).

seat or other safety restraint until the age of five.¹¹⁹ Many of these states with lower age requirements for booster seats also have a weight and/or height exemption, which lowers the required age for those children falling within the exemption. Thus, it is conceivable in several states that a four-year-old child could legally ride restrained by the vehicle's safety belt, which clearly undermines the AAP's recommendation.¹²⁰

E. State Vehicle Safety Belt Requirements

The AAP recommends: children who “are old enough and large enough” should use the vehicle's safety belt.¹²¹ For the most part, states currently include some variation of this recommendation in their laws, but the age at which children are allowed to be restrained by the vehicle's safety belt varies greatly.¹²² All but eight states include specific age ranges for when children should be restrained by the vehicle's safety belt, and for those eight states, their general seat belt laws at first glance appear to fill any gap and require that children of the respective ages be restrained.¹²³ However, in reality, there are major gaps in seat belt coverage, where, for example, in Mississippi children seven years and older are not covered by either the state's child safety restraint law or the general seat belt law.¹²⁴ Thus, for clarity and to ensure all eligible children are restrained by the vehicle's safety belt, states should strongly consider including within their child safety restraint laws a requirement that children be restrained by the vehicle's safety belt when they meet certain parameters.

F. State Rear Seat Requirements for Children

Lastly, the AAP recommends: children under thirteen years old should be restrained in the rear seat of the vehicle.¹²⁵ No state includes

119. See S.D. CODIFIED LAWS § 32-37-1 (2016).

120. See e.g., ALASKA STAT. ANN. § 28.05.095(b)(4) (West 2016) (providing that if a child is “over four years of age who exceeds the height or weight requirements . . . shall be properly secured in a seat belt”); HAW. REV. STAT. ANN. § 291-11.5(a)(3)(A) (West 2011) (allowing a child who is four years of age or older to be restrained by the vehicle's seat belt if the child is over four feet and nine inches tall).

121. See AMERICAN ACADEMY OF PEDIATRICS, *supra* note 38, at 790.

122. See *supra* Part IV.D (discussing the age when a child no longer is required to use a booster seat and may use the vehicle's safety belt).

123. See *Child Safety*, INSURANCE INSTITUTE FOR HIGHWAY SAFETY, HIGHWAY LOSS DATA INSTITUTE, Apr. 2017, <http://www.iihs.org/iihs/topics/laws/safetybeltuse?topicName=child-safety> (comparing state child safety restraint and seat belt laws and noting the gaps).

124. See *id.*

125. See AMERICAN ACADEMY OF PEDIATRICS, *supra* note 38, at 790-91.

this requirement in their laws. Although some states specify children of various ages—anywhere from one to twelve years old—should be restrained in the rear seat, no state uses the age of thirteen.¹²⁶ In fact, Washington, which requires children under the age of twelve be restrained in the rear seat when practical, is the state that comes closest to the AAP's recommendation.¹²⁷ The discrepancy among state laws regarding when children should remain in the rear seat is notable, especially considering the scientific research which reveals that children are much safer in the rear seat of the vehicle.¹²⁸

The above analysis reveals the disparity among state laws in the child safety restraint arena. Yet, the reasoning for the disparity eludes sound logic. For example, why should an eighteen-month-old child riding in a vehicle in Oklahoma be restrained any differently than the same aged child riding in Illinois? Shouldn't this child be afforded the highest level of protection regardless of where he resides? Instead, children who reside in Illinois are allowed by state law to ride forward-facing in a child safety restraint from birth while children who reside in Oklahoma must ride rear-facing until the age of two.¹²⁹ If the children were equally safe whether riding forward or rear-facing, this incongruence could stand to reason. Yet the scientific research unmistakably indicates children are much safer when riding rear-facing until the age of two years old.¹³⁰ This same logic equally applies to whether a child should be restrained in a booster seat or the vehicle's safety belt, where research clearly indicates children should remain in a booster seat until the safety belt appropriately fits, which is typically eight years old at the earliest.¹³¹ State lines construct meaningless barriers when it comes to best practices for child safety restraints.

The question becomes why only four states have subscribed to the AAP's purportedly well-founded recommendations. After all, when it comes to protecting children, it seems logical to assume that lawmakers could unite behind this public health issue and craft laws tailored to

126. See, e.g., COLO. REV. STAT. ANN. § 42-4-236(2)(a)(ii) (West 2011) (requiring children one year and younger and less than twenty pounds to be in the rear seat if available); ME. REV. STAT. ANN. tit. 29, § 2081(3)(C) (2009) (requiring children eleven years and younger and less than 100 pounds to be in rear seat if available); MICH. COMP. LAWS ANN. § 257.710d (2) (West 2009) (requiring children three years and younger to be in the rear seat if available).

127. WASH. REV. CODE ANN. § 46.61.687 (1)(c) (West 2010).

128. See *supra* Part III.E.

129. Compare 625 ILL. COMP. STAT. ANN. 25/4 (West 2008) (not requiring children to be positioned rear-facing at any age), with OKLA. STAT. ANN. tit. 47, § 11-1112(A)(1) (West 2015) (requiring children to be rear-facing until the age of two).

130. See Durbin et al., *supra* note 8.

131. *Id.*

mandate the safest practices for child safety restraints. However, the terms “lawmakers” and “logical” have effectively become mutually exclusive, where, on both sides of the political spectrum, political ideology has become of greater concern than solving matters of public health such as child safety restraint best practices. Thus, to move beyond the political stalemate and delve further into the explanation for the current state of law regarding child safety restraints, with the prospect of developing improved child safety restraint laws, it becomes necessary to consider and address those arguments against strengthening child safety restraint laws.

V. IMPEDIMENTS TO IMPROVED CHILD SAFETY RESTRAINT LAWS

Within the last few years, state lawmakers in several states have introduced legislation seeking to enact more stringent child safety restraint laws.¹³² For example, Tennessee introduced legislation mirroring the AAP’s child safety restraint recommendations.¹³³ The bill initially unanimously passed in the Senate and easily passed in the House of Representatives, but was subsequently withdrawn by the House of Representatives, reportedly due to subsequent concerns voiced by constituents.¹³⁴ Reviewing the reasons for the failure of these bills provides a constructive starting point for determining why state legislatures have been unsuccessful in passing stricter child restraint laws.

A. *Financial Constraints*

One common concern voiced by critics of stricter child safety

132. See, e.g., Mark Nootbaar, *Rear-Facing Seats Could Be The Law For Children Up To 2 Years Old*, 90.5 WESA (Dec. 14, 2015), <http://wesa.fm/post/rear-facing-seats-could-be-law-children-2-years-old> (discussing Pennsylvania’s proposed child safety restraint bill that would have required children to remain rear-facing until the age of two); Laurel White, *Car Seat Bill Would Change Safety Requirements For Infants, Toddlers*, WISCONSIN PUBLIC RADIO (Mar. 10, 2016), <http://www.wpr.org/car-seat-bill-would-hange-safety-requirements-infants-toddlers> (discussing Wisconsin’s proposed child safety restraint bill that requires children to be restrained rear-facing until the age of two).

133. See ASSOCIATED PRESS, *Tennessee Lawmakers OK Longer Car Seat Requirements*, CLARKSVILLE NOW (Mar. 2016), <http://clarksvillenow.com/local/tennessee-lawmakers-ok-longer-car-seat-requirements-edit/>.

134. See Erik Schelzig, *House Kills Bill Requiring Rear-Facing Cars Seats up to Age 2*, THE TENNESSEAN (Mar. 22, 2016), <http://www.tennessean.com/story/news/politics/2016/03/22/house-kills-bill-requiring-rear-facing-car-seats-up-age-2/82137414/>; Chas Sisk, *Tennessee Lawmakers Recall Update To Child Car Seat Law, After Gripes They Went Too Far*, NASHVILLE PUBLIC RADIO (Mar. 10, 2016), <http://nashvillepublicradio.org/post/tennessee-lawmakers-recall-update-child-car-seat-law-after-gripes-they-went-too-far#stream/0>.

restraints laws such as those recommended by the AAP involves the financial impact on parents caused by the requirement to purchase child safety restraints.¹³⁵ For some parents, providing proper child restraint systems for their children may be difficult due to financial hardship.¹³⁶ After all, the AAP's recommendations require a rear-facing child safety restraint until the age of two, a forward-facing seat until the child outgrows it, and a booster seat until the age of at least eight, possibly until age twelve.¹³⁷ Child safety restraints range greatly in price depending on the type and manufacturer of the child safety restraint.¹³⁸ An infant child safety restraint typically ranges from \$60 to \$300, a forward-facing child safety restraint ranges from \$40 to \$450, and a booster seat ranges from \$13 to \$300.¹³⁹ Thus, a parent who attempts to follow the AAP's recommendations could spend as little as \$113 on child safety restraints for a child.¹⁴⁰ Parents could use the same child safety restraints for other children in the family. However, if a child safety restraint has been involved in a vehicle accident, it should no longer be used, and child safety restraints do have expiration dates, which can be from five to ten years from the date of manufacture.¹⁴¹

Although the price of child safety restraints is not insignificant, when conducting a simple financial cost versus benefit analysis, it becomes clear the benefits of child safety restraints significantly outweigh the costs. The couple of hundred dollars spent during a child's lifetime on child safety restraints pales in comparison to the thousands of potential dollars that could be spent if an unrestrained child is injured in a vehicle accident, notwithstanding the long-term physical and emotional impact from such injuries.¹⁴²

135. See, e.g., Tonya Alanez, *Florida Senate Passes Child Booster Seat Bill*, SUN SENTINEL (Apr. 21, 2010), articles.sun-sentinel.com/2010-04-21/news/fl-child-seats-20100421_1_seat-belt-adult-seat-car-seat (recognizing the financial burden child safety restraint laws can put upon a parent).

136. See, e.g., Joel Ebert, *House Makes Rare Move to Recall Approved Car Seat Bill*, TENNESSEAN (Mar. 11, 2016), <http://www.tennessean.com/story/news/politics/2016/03/10/house-makes-rare-move-recall-approved-car-seat-bill/81597006/> (discussing concern that passing stricter child safety restraint legislation that would require children to remain rear-facing until age two would cause financial burden to parents).

137. See AMERICAN ACADEMY OF PEDIATRICS, *supra* note 38, at 789-90.

138. See *Car Seat Buying Guide: Sitting Pretty—and Safe—With the Best Car Seat for Your Child*, CONSUMER REPORTS (Aug. 2016), <http://www.consumerreports.org/cro/car-seats/buying-guide>.

139. See *id.* ("Throwing money at this problem doesn't necessarily mean that you'll get the best-performing seat. Many mid-priced models work as well as or better than pricier ones.").

140. See *id.*

141. See *id.*

142. See Jessie Schiewe, *New State Law Will Mandate Booster Seats for Kids Up to 8 Years*

For some parents, even though the benefits of a child safety restraint clearly outweigh the costs, purchasing the restraint creates a significant financial burden these parents cannot overcome. Parents in this category are very likely to be eligible for a community program or a non-profit organization to assist with the purchase of a child safety restraint.¹⁴³ In Oklahoma, for example, the Oklahoma Highway Safety Office and kid advocacy groups work together to implement a statewide child safety restraint program where families may contact a county health department to schedule an appointment to have any car or booster seat checked to determine if it is properly installed.¹⁴⁴ In addition, eligible families may receive child safety restraints at discounted prices at cost or for no cost.¹⁴⁵

Even some hospitals have programs that assist parents in acquiring a child safety restraint. For example, Palmetto Health Children's Hospital in Columbia, South Carolina, offers child safety restraints to the general public at cost and offers discounts to Medicaid recipients.¹⁴⁶ The Hospital also offers free monthly child passenger safety classes to educate parents on child safety restraints, including how to install them and the appropriate type to use.¹⁴⁷ The Hospital offers a discount to those parents who attend the free class, which allows parents to purchase child safety restraints at significantly reduced prices.¹⁴⁸

Old, OAKLAND NORTH (Nov. 17, 2011), <https://oaklandnorth.net/2011/11/17/new-state-law-will-mandate-booster-seats-for-kids-up-to-8-years-old/> ("Stephanie Tombrello, executive director of Safety Belts U.S.A., explains that when children "get these injuries, there's many years of medical care, education, special guidance for work, long term care and direction into adulthood to think about.").

143. See, e.g., Emily Sutherlin, *How to Get a Free Infant Car Seat for Low Income Families*, EXAMINER.COM (May 31, 2012), <http://www.examiner.com/article/how-to-get-a-free-infant-car-seat-for-low-income-families> (discussing the different places that offer free child safety restraints to parents who are in desperate need, including WIC offices, insurance policies, state police and fire departments, and hospitals).

144. *Child Passenger Safety*, OKLAHOMA STATE DEPARTMENT OF HEALTH, https://www.ok.gov/health/Protective_Health/Injury_Prevention_Service/Child_Passenger_Safety/index.html (last visited Apr. 21, 2017).

145. See *id.*

146. See *Palmetto Health Children's Hospital Car Seat Purchasing Program*, <http://ch.palmettohealth.org/body.cfm?id=214> (last visited Apr. 21, 2017). Medicaid recipients may purchase an infant child safety restraint for sixty dollars, a forward-facing child safety restraint for thirty-five to seventy dollars, and a booster seat for twelve dollars. See *id.*

147. See *id.*

148. See *id.* For example, attendees of the free child passenger safety class may purchase an infant child safety restraint for forty dollars, a forward-facing child safety restraint for twenty to forty-five dollars, and a booster seat for eight dollars. See *id.*

B. *Child Discomfort*

Some critics of the AAP's child safety restraint recommendations, especially those who are parents, emphasize the importance of the child's comfort when riding in a child safety restraint.¹⁴⁹ The AAP's recommendation that a child remain rear-facing until the age of two strikes a chord with these critics who question whether children may comfortably remain rear-facing until the age of two.¹⁵⁰ They are genuinely concerned children's legs may be injured in the event of a vehicle accident or children's legs will be too cramped.¹⁵¹ After all, if children are not comfortable when riding in a vehicle, they can make the trip unenjoyable for the other passengers in the vehicle.

Beyond mere child discomfort, some parents are concerned about a child's development when a child is riding rear-facing. Specifically, parents are concerned children should be facing forward to view their outdoor surroundings, which is more difficult when rear-facing.¹⁵² Along these lines, some parents also prefer their children ride forward-facing so the parents may better view their children from the front seat.¹⁵³ Other parents prefer their children to ride forward-facing to ensure their children are not choking.¹⁵⁴ These parental critics appear to acknowledge the safety benefits of restraining a child in a rear-facing seat until the age of one, but they think being required to restrain a child after his first birthday ventures too far into the realm of decision-making which parents should be allowed to control on behalf of their children.¹⁵⁵

149. See Melody Gutierrez, *Bill Would Keep Kids in Rear-Facing Seats Until Age 2*, SFGATE (last updated Jan. 5, 2015), <http://www.sfgate.com/bayarea/article/Bill-would-keep-kids-in-rear-facing-seats-until-5993499.php>.

150. See *id.*

151. See Dr. Leslie Greenberg, *Rear-facing Car Seat Until Age 2? Why? Really?*, DR. GREENBERG'S BLOG (Nov. 15, 2011), <https://drlesliegreenberg.com/2011/11/15/rear-facing-car-seat-until-age-2-why-really/> (discussing parental concerns that their child's leg will be broken if there is an accident and their child's legs were cramped).

152. Janet O, *Gov. Brown Mandates New Rear-Facing Car Seat Law*, ABC7NEWS (Sept. 22, 2015), abc7news.com/traffic/gov-brown-mandates-new-rear-facing-car-seat-law/996619/ (quoting a parent who stated, "I think it's better for kids to point at things see things and be aware of surroundings").

153. See University of Michigan Health Systems, *Almost Three-Quarters of Parents Turn Car Seats to Face Forward Too Early*, EUREKALERT! (Jan. 6, 2015), http://www.eurekalert.org/pub_releases/2015-01/uomh-ato010615.php (listing parent's desire to view their children as one of the reasons parents prefer that their children ride forward-facing).

154. See Darren Qunell, *Rear-Facing Until 2 Years Old: Why Not?*, CARSEATBLOG.ORG, March 23, 2011, <http://carseatblog.com/9452/rear-facing-until-2-years-old-why-not/> (discussing concerns parents have regarding keeping their children rear-facing until the age of two).

155. See Shaver, *supra* note 60 (quoting parents who questioned rear-facing child safety restraint requirements: "Do any of the folks who studied this have small children?" . . . 'Have they

These parental concerns that children who are rear-facing beyond the age of two will be uncomfortable and even less safe are understandable; yet, the reasons for parents to turn a child forward-facing from rear-facing at the age of one is based upon tradition, not valid scientific evidence. These concerns also discount the adaptability of children. Children, who are extremely more flexible than adults, have the physical capability to keep their legs crossed for much longer periods of time than adults.¹⁵⁶ Even when children have the choice as to their sitting position when sitting on the floor, children will typically choose a position that resembles the position of a child in a rear-facing child safety restraint.¹⁵⁷

Parents who are concerned about their children's visibility if rear-facing or whether the parents can best view their children in that position not only underestimate the adaptability of children, but are uninformed about the actual riding experience of children who are riding rear-facing. For example, a child who is riding in a convertible child safety restraint, as compared to an infant seat that is used by a child typically until the age of one, can adequately see his outside surroundings because he is sitting at the same height he would if he were forward-facing.¹⁵⁸ And for those parents who prefer to see their children's faces in the back seat rather than the back of a child safety restraint, there are soft mirrors that a parent may easily install that allows the parent to see the child's face in the mirror when the child is riding in a rear-facing child safety restraint.¹⁵⁹

These concerns regarding a child's comfort while riding rear-facing severely misplace the purpose of child safety restraints, which is to best restrain a child in the event of a vehicle accident. The research is overwhelmingly clear that children are safer when riding rear-facing than when riding forward-facing.¹⁶⁰ Any potential leg injuries in the

tried to keep a squirrely, anxious and frustrated 18-month-old rear-facing?" . . . "Where are you supposed to put the kids' legs?").

156. *Id.* ("As for the limited legroom, pediatricians say children are far more flexible than adults, which allows them to sit comfortably with their legs folded for long periods.").

157. Katie Loeb, *7 Myths About Extended Rear Facing Car Seats*, BABBLE, <https://www.babble.com/baby/6-myths-about-extended-rear-facing/> (last visited Apr. 21, 2017) (discussing a child's typical seating position).

158. *See Rear Facing Myths*, CARSEAT.SE (Apr. 15, 2009) www.carseat.se/rear-facing-myths/.

159. *See* Christie Haskell, *Ways to Keep Your Kid Entertained While In a Rear-Facing Car Seat*, CAFEMOM (Dec. 7, 2011), http://thestir.cafemom.com/toddlers_preschoolers/129674/ways_to_keep_your_kid (suggesting a "safe (soft) mirror" to use for children to be able to better see their parents and keep the children happy while riding in a rear-faced child safety restraint).

160. *See* Durbin et al., *supra* note 8, at e1054.

event of a vehicle accident if the child were riding rear-facing would be much less severe than the potential head and spine injuries if the child were riding forward-facing.¹⁶¹ To be sure, children are accustomed to riding rear-facing at a very young age, and it is not until the parent moves the seat forward-facing does the child actually realize the difference between the two. Thus, parents must carefully balance their decision to keep their child comfortable with the need to restrain their child in the safest manner, but at the end of the day, child comfort should be subordinated to safety.

C. *Governmental Overreach*

One of the most prevalent criticisms lawmakers who have attempted to introduce more stringent child safety restraint regulations have received is that mandating a child remain in a child safety restraint in a rear-facing position until the age of two or in a booster seat until the age of at least eight, or until the child reaches a particular height, is too much governmental overreach into a decision-making area that should be left to parents.¹⁶² As reportedly stated by one Tennessee state lawmaker who questioned the need for more stringent child safety restraint legislation, “[w]hen you have a child that’s 12 years old and 4 foot 9 inches, putting them in a car seat doesn’t make much sense—they’re big enough to sit in a seat belt. It’s the government trying to stick their hand and fix something that’s not broke.”¹⁶³ Instead, viewing the history of child safety restraint legislation, where child safety restraints were not even required in all states until 1985, many lawmakers and parents consider their own childhood when child safety restraint laws were much more lenient and anecdotally question the need for more stringent regulations.¹⁶⁴ These lawmakers and parents survived with the relaxed regulations, so why does the government need to get involved in an area where parents have typically determined how to secure their children in a child safety restraint?

These critics have an extremely valid point. Governmental

161. See Shaver, *supra* note 60.

162. Diane Smith, *Bill Would Keep Children in Rear-Facing Car Seats Longer*, STAR-TELEGRAM (Apr. 5, 2015), www.star-telegram.com/news/local/community/fort-worth/article17457803.html (citing State Rep. Ron Simmons, R-Carrollton, who voted against a more stringent child safety restraining bill in committee because it was too much of a government overreach that signaled an unnecessary infringement on parental rights).

163. Erik Schelzig, *House Backpedals on Restraints for Kids in Cars*, KNOXBLOGS (Mar. 10, 2016), knoxblogs.com/humphreyhill/2016/03/10/26223/.

164. See Loeb, *supra* note 157.

regulation at the state and federal level has steadily increased throughout the last several decades to the point where the government has inserted, or at least attempted to insert, itself into almost every facet of daily life.¹⁶⁵ These attempted areas of governmental intrusion, which are humorous to most Americans, are newspaper headline grabbers such as Montana's attempt to ban yoga pants as being indecent exposure or New York City Mayor Michael Bloomberg's attempt to ban large soda drinks.¹⁶⁶ With vast and extensive state and federal regulations, the mention of yet another regulation evokes public outcry. Thus, when lawmakers introduce legislation altering the way parents currently restrain their children in a car, the automatic and unsurprising response is public backlash.¹⁶⁷ But child safety restraint legislation, unlike these more trivial and superficial issues, involves an important area of public health that necessitates consideration and discussion for improved regulations.

In other areas of great importance to children and public health, lawmakers have taken action to implement regulations deemed necessary to protect children. For example, in the area of smoking, lawmakers were concerned about the effects of second-hand smoke on children who were involuntarily exposed to it when their parents smoked around them. Infants exposed to second-hand smoke are at increased risk for sudden infant death syndrome, and both infants and older children exposed to second-hand smoke are at increased risk for respiratory infections, asthma, and middle-ear infections.¹⁶⁸ There is a clear scientific consensus that second-hand smoke is a real and substantial threat to children's health, not only in childhood but also in adult life.¹⁶⁹ Based upon this actual threat, a majority of states enacted legislation to protect children and others from the harmful effects of second-hand smoke in public places, and several states and municipalities banned smoking in a car when children are present.¹⁷⁰

165. See Michael D. Tanner, *Too Many Laws, Too Much Regulation*, CATO INSTITUTE (Mar. 2, 2016), <http://www.cato.org/publications/commentary/too-many-laws-too-much-regulation>.

166. See *id.*

167. See e.g., Diane Smith, *Bill Would Keep Children in Rear-Facing Car Seats Longer*, STAR-TELEGRAM (Apr. 5, 2015), <http://www.star-telegram.com/news/local/community/fort-worth/article17457803.html> (noting that Texas state congressman who voted against a stricter child safety restraint bill felt that the bill infringed upon the rights of parents).

168. Margaret A. Hawthorne, Lindsay M. Hannan, Michael J. Thun, & Jonathan M. Samet, *Protecting Our Children from Second-hand Smoke*, UICC at 19-21 (2008), http://www2.aap.org/richmondcenter/pdfs/UICC_english.pdf.

169. *Id.* at 21.

170. *Smokefree Laws and Policies*, AMERICAN LUNG ASSOCIATION, <http://www.lungusa2.org/slati/reports/smokefree-states-072015.pdf> (last visited July 15, 2016).

Although these restrictions appear to invade individual liberty by forbidding adults from smoking anytime and anywhere they want, this type of restriction is necessary to protect children, a vulnerable group that lacks the voice to protect itself.¹⁷¹

When applying the same analysis regarding second-hand smoke (i.e., sometimes individual liberty must yield when protecting child health) to the area of child safety restraints, the argument against stronger child safety restraint regulations becomes attenuated. Similar to the research regarding the effects of second hand smoke on children, the child safety restraint research regarding the results when a child is not properly restrained is scientifically unequivocal—children are safer when they are restrained in accordance with the AAP's recommendations.¹⁷² Mandating parents restrain their children for a longer period of time or in a different manner than the parents would independently choose does arguably invade the privacy rights of parents.¹⁷³ Yet, this is an area of such importance to the public health of children that the privacy rights of the parents should be subordinated to the safety of their children, just as several states have done in the area of second-hand smoke.¹⁷⁴

Unfortunately, due to the sheer number of increasing regulations imposed upon Americans, the discussion of yet another set of regulations, even in an area as important as child safety restraints, breeds trepidation and cynicism.¹⁷⁵ For most Americans, the thought of complying with another regulation is overwhelming, especially if it is a regulation that seems inconsequential with no correlative benefits.¹⁷⁶ The correlative benefits of child safety restraint regulations that mirror

However, the laws control only smoking in public areas, and thus, they do not protect children from the effects of second-hand smoke at home.

171. See *Smoke-free Vehicles When Children are Present*, GLOBAL ADVISORS SMOKEFREE POLICY (GASP) (June 22, 2015), http://www.njgasp.org/wp-content/uploads/2014/05/f_SF-carskids-info-arguments.pdf (“The right to privacy is an important tenet of the American way of life. But certainly, when children are harmed from exposure to the class A carcinogen secondhand smoke . . . , which is in the same class as asbestos and benzene, then public health and safety take precedence over smoking around children.”).

172. See Durbin et al., *supra* note 8, at e1053-57.

173. See, e.g., Jill A. Jarvie & Ruth E. Malone, *Children's Secondhand Smoke Exposure in Private Homes and Cars: An Ethical Analysis*, 98 AM. J. PUBLIC HEALTH 2140, 2142-44 (2008) (discussing how the state has an interest in protecting the health and welfare of children; thus, temporarily restraining adult autonomy through second hand smoking restrictions in private spaces is clearly justifiable).

174. See *id.*

175. See Sohoni, *supra* note 19, at 1626-28 (addressing the “mistrust in government” that Americans currently have, which translates to the desire for fewer regulations).

176. See *id.*

the AAP's recommendations, however, are evident, and once the public becomes educated about these benefits, their concerns about complying with the corresponding regulations will be alleviated.¹⁷⁷ In an important area of public health concern such as child safety restraints, regulations are necessary to ensure children are protected from dangerous outside harms like vehicle accident injuries that occur when improperly restrained or unrestrained in a child safety restraint.

VI. IMPLEMENTATION OF AAP'S CHILD SAFETY RESTRAINT RECOMMENDATIONS

As discussed previously, the AAP's recommendations are based upon well-founded research that clearly shows that children should be restrained differently and for a longer period of time.¹⁷⁸ Yet, only four states have laws incorporating the AAP's recommendations.¹⁷⁹ For those remaining states that have not adopted the AAP's recommendations, the disparity among their child safety restraint regulations is disturbing, where in some states, children as young as four years old may ride in a vehicle restrained only by the vehicle's seat belt.¹⁸⁰ To be sure, if states enacted legislation that mirrored the AAP's recommendations, children would be safer, as research convincingly reveals that states with stricter child safety restraint laws have fewer child deaths and injuries from vehicle accidents.¹⁸¹ Laws educate and inform the public.¹⁸² In fact, parents depend on the law to protect their children and view the laws as providing safety parameters on child safety restraint best practices.¹⁸³ However, state lawmakers have been reluctant to introduce legislation

177. See Shaver, *supra* note 60 (quoting Dennis Durbin, author of the AAP's 2011 recommendations, who recognized that parents may not realize why their children should remain rear-facing until the age of two, but that "if more parents understood why it's safer . . . most would gladly delay' turning their seats around").

178. See Durbin et al., *supra* note 8.

179. See CAL. VEH. CODE § 27360 (West effective Jan. 1, 2017); N.J. STAT. ANN. § 39.3-76.2a (West effective Sept. 1, 2015); OKLA. STAT. tit. 47, § 11-1112 (West 2015); 75 PA. CONS. STAT. § 4581 (2016).

180. See *supra* note 175 and accompanying text.

181. See, e.g., *Buckle Up: Booster Seats*, SAFE KIDS WORLDWIDE at 10 (September 2014), http://www.safekids.org/sites/default/files/documents/ResearchReports/skw_cps_study_2014_v8-no_embargo.pdf ("Researchers found that states that passed laws requiring the use of a child restraint with internal harness or a booster seat until age 7 or 8 saw reductions in the per capita rate of both fatal and nonfatal motor vehicle crash injuries, and a threefold increase in the per capita rate of child seat use among children in crashes.").

182. See *id.* at 12 ("[C]hild safety restraint laws also send a powerful message about the importance of car seats to parents.").

183. See *id.*

mirroring the AAP's recommendations and, for those lawmakers who have introduced such legislation, it has overwhelmingly not passed.¹⁸⁴

At initial glance, it might appear that the solution to enacting improved child safety restraint laws is through the federal government, which would implement federal child safety restraint regulations. However, the likelihood the federal government would enact such regulations is extremely doubtful not only based upon constitutional anti-commandeering principles, but also due to the unlikelihood that such a bill would pass through the legislative process.¹⁸⁵ Thus, the most likely scenario for the implementation of child safety restraint laws mirroring the AAP's recommendations is through individual state-by-state legislative processes. For such state legislative action to prevail, however, other states' failed legislative attempts must be analyzed to rectify any perceived deficiencies in either the language or presentation of the proposed regulations.

One acknowledged reason for the non-passage of more stringent child safety restraint laws is the lack of constituency support, which may in part stem from misinformation concerning the AAP's recommendations.¹⁸⁶ For example, in Tennessee, the proposed child safety restraint bill incorporated the AAP's recommendations and passed both the House and the Senate, but was subsequently recalled before it was sent to the governor for his signature.¹⁸⁷ Lawmakers who supported the recall said "concerned constituents" questioned the potential effects of the bill, specifically the financial impact and the extended age requirements.¹⁸⁸ According to the bill's sponsor, there was confusion about the age requirement for children riding in booster seats. Adding to that confusion, media reports stated that children would be required to ride in a booster seat until the age of twelve, when actually age twelve was simply a backstop for those children who did not meet the minimum height requirement.¹⁸⁹ This misinformation led to the bill's ultimate demise. Thus, for child safety restraint laws that mirror the AAP's recommendation to be passed, lawmakers must gain the support of their constituents by ensuring that these constituents fully comprehend the

184. See *supra* notes 132-34.

185. See *Printz v. U.S.*, 521 U.S. 898, 900 (1997) ("[T]he Federal Government may not compel the States to enact or administer a federal regulatory program."); see also *supra* notes 132-34 (discussing the difficulty states have encountered when trying to pass stricter child safety restraint legislation).

186. See Ebert, *supra* note 136.

187. See *id.*

188. *Id.*

189. See *id.*

substance and purpose of the proposed legislation, i.e., to better protect the nation's children when riding in a vehicle—not to create burdensome, purposeless rules for parents.¹⁹⁰ A public awareness campaign is also necessary to assure constituents fully grasp the public health issue confronting children in this country.¹⁹¹

One powerful method of better informing the public of the necessity for improved child safety restraint regulations is to highlight the real, personal stories of parents who have suffered the perils of lax child safety restraint laws. For example, Joel, an eighteen-month-old child, was riding in a front-facing child safety restraint in the back of the car his mother was driving.¹⁹² The car was traveling at approximately thirty-five miles per hour when it hit a tree.¹⁹³ In the collision, Joel's spine detached from his skull and caused an injury called internal decapitation.¹⁹⁴ Joel's pediatrician had reportedly told Joel's mom that it was okay to turn Joel forward-facing.¹⁹⁵ After the accident, Joel had to wear a halo for nine weeks due to his injuries.¹⁹⁶ He underwent shoulder surgery over a year after the accident to repair nerves in his right shoulder, and it took over two years after the accident for eighty percent of the nerves in his right shoulder to properly reattach.¹⁹⁷ Based upon this experience, Joel's family became advocates for stronger child safety restraint laws and praised the AAP's 2011 recommendations.¹⁹⁸

Joel's story is unfortunately just one of the many tragic stories where remorseful parents have endured severe injuries to their children and, in some cases, the death of their children due to unsafe child safety

190. See, e.g., *Gov. Brown Signs Bill Requiring Children To Stay In Rear-Facing Car Seats Until Age 2*, CBS LOS ANGELES (Sept. 22, 2015), <http://losangeles.cbslocal.com/2015/09/22/gov-brown-signs-bill-requiring-children-to-stay-in-rear-facing-car-seats-until-age-2/> (quoting mother who, when asked about California's child safety restraint law, responded, "I'm not a big proponent of having the state tell you what you can and can't do with your child. . . . But I think that in this case, it's not really an opinion. It's just something that's safer for them.").

191. See, e.g., NHTSA, safercar.gov (last visited Apr. 21, 2017) (highlighting the importance of car safety for all ages and providing the link "Parents Central" as an easy on-line tool for child safety restraint education).

192. Kate Goodin, *Joel's Journey: Why Rear-Facing Car Seats are Safer*, PARENTING, <http://www.parenting.com/blogs/show-and-tell/kate-parentingcom/rear-facing-car-seat-safety> (last visited Apr. 21, 2017).

193. *Id.*

194. *Id.*

195. *Id.*

196. JOEL'S JOURNEY (Feb. 5, 2016), <http://www.joelsjourney.org/>.

197. *Id.*

198. See *id.* (celebrating the fact that the American Academy of Pediatrics finally issued new recommendations advising parents to keep their children in rear-facing child safety restraints until they are two years old or until they have reached the maximum height and weight limits for the child safety restraint).

restraint practices.¹⁹⁹ Many of these parents have made child safety restraint best practices their newfound mission, with the hope that no parent makes the same mistake that leads to their same unbearable grief.²⁰⁰ In fact, some of these parents have championed improved state child safety restraint legislation based upon their own experiences.²⁰¹ If other parents hear these anecdotal stories, they would likely be much more receptive to altering their current child safety restraint methods. Thus, state lawmakers who propose improved child safety restraint legislation should consider these personal stories to help educate the public about the legislation's purpose.

In a public awareness campaign, state lawmakers would also be prudent to strongly rely on the convincing research behind the AAP's recommendations when proposing improved child safety restraint legislation.²⁰² Most parents strongly desire their children be kept safely restrained while riding in a vehicle, and yet many of these parents are uninformed about the best practices for restraining their children and the potential consequences if these practices are not followed in the event of an accident.²⁰³ State lawmakers must educate constituents on the child safety restraint research and the necessity for improved child safety restraint legislation.²⁰⁴ If state lawmakers adeptly portray the current

199. See, e.g., Pat Reavy, *Toddler Died Because of Improperly Installed Car Seat, Police Say*, KSL (Dec. 5, 2013), <http://www.ksl.com/?nid=148&sid=27912884&comments=true> (describing vehicle accident where three-year-old child died who was forward-facing in a child safety restraint that had not been connected to the seat properly, but an eighteen-month-old child in a rear-facing child safety restraint survived).

200. See, e.g., Susan Donaldson James, *Why This 'Car Seat Cop' Mom Wants to Save Your Child's Life*, TODAY (Dec. 9, 2014), <http://www.today.com/parents/car-seat-cop-mom-wants-save-your-childs-life-1D80345801> (discussing mom whose eleven-month-old son died when riding forward-facing in a child safety restraint with only the chest buckle fastened, who now seeks to educate parents on the best practices for child safety restraints).

201. Nick Charles, *Anton's Law*, PEOPLE (Aug. 20, 2011), <http://www.people.com/people/archive/article/0,,20135130,00.html> (detailing how mother of four-year-old son who died in a vehicle accident while riding in the front seat and restrained by the vehicle's safety belt championed the first state booster seat law).

202. See Shelby Grad & Patrick McGreevy, *California Mandates Rear-facing Car Seats for Kids Till They're 2*, L.A. TIMES, Sept. 23, 2015 (quoting author of California child safety restraint bill, which was passed: "Despite studies and educational campaigns by doctors and the National Highway Traffic Safety Administration, not enough parents are changing their behavior. An overwhelming number of parents still place their children in a forward-facing position too early. . . . According to medical professionals, the heads of young children are heavier, and their necks and spinal cords are not fully developed. In an accident, young children facing forward have a 75% greater chance of injuring their spines or even breaking their necks, due to impact.").

203. See Michelle L. Macy et al., *Looking Back on Rear-Facing Car Seats: Surveying U.S. Parents in 2011 and 2013*, 15(5) ACADEMIC PEDIATRICS 526, 529-31 (Jan. 5, 2015).

204. See *id.* at 531 ("Modernizing state laws to match current national guidelines may be one mechanism to encourage parents to delay the transition to forward-facing car seats.").

child safety restraint landscape, where the majority of states do not have laws that adequately protect children even in the face of compelling research, constituents will be much more willing to consider proposed child safety restraint legislation seeking to protect children.

Some states, although not many, have successfully enacted legislation mirroring the AAP's recommendations.²⁰⁵ Overwhelmingly, these states focused on childhood safety coupled with the resounding scientific evidence to push for strengthened child safety restraint laws.²⁰⁶ For example, the author of the Oklahoma child safety restraint bill explained, "[i]t's just common sense, pro-life legislation to try to save the lives of children While we are required to buckle up, we aren't required to buckle them up in a way that would save their lives."²⁰⁷ In California, lawmakers focused on the AAP's recommendations and underlying scientific evidence and determined its validity.²⁰⁸ The lawmakers also recognized the importance of having a law that encompassed the AAP's recommendations to ensure parents followed the best practices in buckling up their children because in the absence of such a law, parents would be less likely to follow the AAP's recommendations.²⁰⁹ The few states that have enacted child safety restraint legislation mirroring the AAP's recommendations have paved the way for other states to follow their lead, and other states are advised to follow their lead.²¹⁰

To instigate the propagation of strengthened child safety restraint legislation, presented below is a model act that tracks the AAP's recommendations that may easily be used by states that desire to enact

205. See *supra* note 87 and accompanying text.

206. Chellie Mills, *Governor Signs Bill that Changes Car Seat Requirements for Oklahoma Children*, KFOR.COM (June 5, 2015), <http://kfor.com/2015/05/18/proposed-law-would-change-car-seat-requirements-for-oklahoma-parents/>; see also Lindsey Renuard, *New Car Seat Laws go into Effect November 1*, SCIATOOK JOURNAL (Oct. 22, 2015), http://www.tulsaworld.com/communities/skiatook/news/new-car-seat-laws-go-into-effect-november/article_0a7af5e4-e453-59fc-b6ce-d951c8ffa56b.html (quoting spokesperson from the Tulsa's Safe Kids Coalition who explained how "[r]ear facing for as long as possible is your child's best bet in an accident. . . . The neck and spinal cord are still developing in young children. Rear-facing seats cradle the child through a crash and distribute the force across their back, often saving them from serious spinal injury. . . . Concerns the child will be uncomfortable if their legs are touching the back of the vehicle seat is not supported by any evidence.").

207. Mills, *supra* note 206.

208. See Cal. Bill Analysis, 53 Assemb. (Apr. 4, 2015).

209. See Cal. Bill Analysis, 53 Assemb. (Apr. 20, 2015).

210. See Bae et al., *supra* note 33, at 8 ("Even if scientific evidence supports the effectiveness of a policy, state legislator's attention to the issue may not occur at a significant level or materialize into legislation until such laws have shown to be successful or at least come into existence in another state.").

child safety restraint legislation mirroring the current best practices for safely restraining children, from infancy through adolescence.

Model Child Safety Restraint Act

- A. A child under two years of age shall be restrained in a rear-facing child passenger restraint system unless the child weighs more than forty (40) pounds or is more than forty (40) inches tall.²¹¹
- B. A child between two and four years of age and weighing less than forty (40) pounds or is less than forty (40) inches tall shall be secured: (1) in a rear-facing child passenger restraint system using a five-point harness until the child reaches the weight and height limits specified by the manufacturer of the child passenger restraint system; or (2) in a forward-facing child passenger restraint system using a five-point harness.
- C. A child between four and twelve years of age, if not taller than four (4) feet and nine (9) inches in height, shall be secured: (1) in a forward-facing child passenger restraint system using a five-point harness until the child reaches the weight and height limits specified by the manufacturer of the child passenger restraint system; or (2) in a booster seat that is secured by the vehicle's seat belt system.
- D. A child over the age of twelve years or at least four (4) feet and nine (9) inches in height shall be secured by the vehicle's seat belt.
- E. Children under the age of thirteen shall be secured in the rear seats of vehicles that are equipped with rear seats, when possible.

This act, which tracks the AAP's recommendations, ensures that states are following the best practices for safely securing a child in a safety restraint. For the majority of states whose child safety restraint regulations fall short of best protecting children in their state, this act or similar legislation should be implemented.

211. The reasoning for including the specific weight and height requirements rather than using the AAP's language "until they reach the highest weight or height allowed by the manufacturer" is because the vast majority of child safety restraints that may be used rear-facing have a weight limit of forty pounds and a height limit of forty inches. *See supra* note 49 and accompanying text. Thus, by specifying these limits, parents have more clarification stated within the law regarding these limits.

VII. CONCLUSION

Deaths of children due to vehicle accidents have drastically decreased since 1985, the year in which all states enacted laws requiring children to be secured in child safety restraints when traveling in a vehicle. Yet, vehicle accidents remain the leading cause of death for children in this country, with at least three children under the age of fourteen dying each day and 462 suffering from severe injuries due to vehicle accidents.²¹² In 2011, the AAP set forth recommendations seeking to lower these troubling statistics, but thus far, only four states have enacted legislation that mirrors, at least in part, the AAP's recommendations. These states have charted a necessary path for other states to follow. A few states have attempted to pass stronger child safety restraint laws, but were unsuccessful due, in part, to misinformation surrounding the laws or concerns regarding governmental overreach. Nonetheless, states that have not enacted stronger child safety restraint laws need to heed the AAP's recommendations and enact legislation that better protects children who otherwise will continue to be buckled up in a way that conflicts with the compelling scientific evidence.

As the author of Oklahoma's child safety restraint bill, which included the AAP's recommendations, succinctly explained, "[w]hile we are required to buckle up, we aren't required to buckle them up in a way that would save their lives."²¹³ It is time for all states to require children be buckled up in a way that would save their lives.

212. *Traffic Safety Facts, 2012 Data Children*, NHTSA at 1 (Apr. 2014), <https://crashstats.nhtsa.dot.gov/Api/Public/ViewPublication/812011>.

213. Mills, *supra* note 206.